



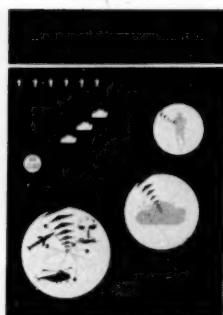
Marine Corps Gazette

OCTOBER 1955
NUMBER 10
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COVER



Through an interpretive design, TSgt D. W. Kiser compares the stalemate of positional trench warfare of WW I, the concentrated thrusts and pincer movements characteristic of the mechanized warfare in WW II and Liddell Hart's proposed concept (page 10) for the thermo-nuclear era—"an offensive fluidity of force." Today, with tactics in an evolutionary state, is the time for forward thinking and stimulating military thought. Those who have progressive ideas are encouraged to air their tactical concepts. The Marine Corps Association was formed, and the GAZETTE was founded, for just that purpose.

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message center

Hold On

... Regards Major R. M. Hunt's article *The Helicopter—An Airplane Not a 6 x 6*, the Major has presented an interesting article and some convincing points. However, on some points he was not so convincing. Specifically—"its pilot must be a competent, fully qualified Naval Aviator." Wishful thinking and a rather expensive concept! In the first place: Naval Aviators do not want to fly helicopters! For them, being shifted from appealing jets to the whirlybirds is comparable to a hard-charging O3 being assigned as S & C files officer when there is a good fire-fight going on. Naval Aviators want to fly fixed wing aircraft! Secondly, the use of NAs as helicopter pilots is a waste of trained manpower. The requirements for the two jobs are considerably different. A syllabus of instruction for the Naval Aviator is much longer and requires higher physical and mental standards than that of the 'copter pilot. Thirdly, being taxpayers, we should all be concerned with reducing the cost of training our fliers. The cost of turning out a helicopter pilot is considerably less than that for the Naval Aviator (who must still receive additional training to fly the 'copters).

Major Hunt argues—but not cogently—against assigning helicopters to the tactical units "down to and including the company level." That level is where the war is won—or lost! We have a new tactical device; let's get it down where it can help the infantryman, who needs all the help he can get!

The most dangerous idea presented in the article concerns the "experienced helicopter pilot assigned to the DASC for control and analysis of requests for helicopter missions." If one can draw the inference from this that these men through their "control and analysis" have the power to refuse permission for requested flights from the tactical commanders, then we are in for trouble. By having the 'copters an integral part of the division, the ground commander can say "yes" or "no" as to whether or not to accept his staff helicopter pilot's advice or whether to use the craft on any particular mission. The point is the heart of the US Army vs US Air Force battle over close air support. In short,

the Army wants close air support when they want it! The Air Force says, "Fine, after we take care of our more pressing needs." As long as any supporting arm can veto its own use, then the tactical ground commander, who has over-all responsibility for accomplishment of the mission, is severely handicapped.

The article's author states that, "Many officers accept the methods by which they (helicopters) were employed there (Korea) as standard operating procedure. Such a tendency is not surprising, but it denotes a lack of understanding of the actual capabilities and limitations of rotor-driven aircraft." That is a surprising accusation, to say the least! The Korean war methods I saw employed were reconnaissance, casualty evacuation, wire-laying, supply and troop movement—all worthwhile missions and ones which will doubtless be continued in the future.

The 'copter is here to stay—but let us be careful in establishing the doctrine for its use.

CAPT K. STEELE

Cherry Point, N. C.



Professional Libraries

... Rear Admiral Hayes in *The Military Officer and His History* (July 1955) asks, "Why is the US military profession today unable to produce writers?"

In my opinion part of the answer lies in the lack of well-developed professional libraries.

This may seem surprising, especially in view of the number of well-stocked, expertly staffed libraries maintained at Naval Bases by BuPers and the hard-working Naval District librarians. However, these libraries must serve the varied interests of their readers, which are a cross-section of the reading Ameri-

can public. Therefore, it is often possible for a fairly active reader to read every available military book in many libraries and still find large areas of military thinking untouched.

Fortunately, the solution to the problem of lack of material need not be as difficult or expensive as it may first appear. Compared to our present library activities the establishment of a small, but widespread, professional library service would require very moderate efforts.

The first and most important need is for a more extensive collection of military books than most local libraries (civil, collegiate, private or military) can supply. One solution might lie in combining the allotment now devoted by three or four local libraries to military titles, and with those funds providing one centrally located professional library.

Not only books, but also periodicals must be acquired much more extensively than is now the case. The US Army and US Air Force produce a number of publications of the highest professional reputation, which are not often available in naval libraries. An important but rarely seen example is *The Air University Quarterly Review*, a journal which cannot be neglected in developing a military education.

Administratively it may not be practical to assign our professional library needs to the station libraries which serve our general needs so well. On the surface it would appear an ideal opportunity to enlarge the scale of our present Information and Education service, which on many stations already maintains collections of books. Or perhaps each major shore command could organize such an activity—more than a few subscription libraries operate in this country.

Whatever solution is eventually found, we can only expect to develop forceful military writers or maintain an officer corps well informed on military matters if we bring the sources of information within reach.

LT (jg) D. P. KIRCHNER

Warrington, Fla.

... The military study of history as recommended by RAdm Hayes in the July issue of the *GAZETTE* is a worthy expenditure of time. However, its value is lost if the lessons contained therein cannot be applied to the conduct of war. It would be very similar to reading the rules and directions for playing tennis but not translating these into the art and skill required to play a good game.

If the schooling of officers does not seem to produce military philosophers,

it may be that too much manner and method of warfare is taught and not enough of the art of warfare. If military philosophy is becoming the realm of the professor and not the soldier, it is because the professor is more concerned with the technique or art of the science and not the method or manner. A distinguished rifle shot is one, not simply because he knows the characteristics of his weapon and ammunition, the effects of wind and light, the positions and rules, but because of the skill and art he uses in combining all of these in a match.

It may be that the study of military history should be injected into our school system so that we could acquire some degree of art of warfare. Perhaps we need a little more art and a little less manner.

LT COL W. F. FRANK

Fairfax, Va.

Cheers for Schipke

... Master Sergeant Andrew C. Schipke (*Message Center*, July) is not the only one who has experienced a feeling of amazement and shame . . . Let's not make excuses; let's make corrections!

... I also agree with Master Sergeant Schipke's suggested policy of sending all Marines to duty with an infantry unit after leaving boot camp. Let them find out what the Marine Corps is all about first and then send them to guard duty or a specialist outfit. Let's first make good Marines, then make specialists!

CAPT NORMAN W. HICKS

USS Baltimore

... I have just finished reading MSgt Andrew C. Schipke's letter, and find him 100 per cent correct. All too often men out of boot camp are assigned to non-FMF units. For what? Be it radio man, supply clerk, cook or driver, a Marine's first and most important ability is to fight and win. To do this, he must be trained in an infantry outfit, not a cook's school, or a fiscal and accounting school. Grant you, we do need this man, but why not make a fighting Marine out of him first, make him proud of his uniform and country, and then with a background of real pride and duty, he can go on to specialize in a field of his choice.

I've seen many good men leave the Corps because they couldn't get in an infantry unit and be Marines. Instead they remained in their field, doing a good job, but not actually sensing they were Marines. How can they be? Eight to four-thirty shift, one hour for lunch, usually one drill period and one inspection a week; in many cases there are no rifles to be issued — no combat training at all — just a regular humdrum routine. When they do request transfer

to an FMF outfit, they are told they are too valuable to go. Their tour is up, and out they go, disgusted.

Let's be Marines first; specialists second.

SGT EDWARD R. PARAUKA

State Dept, Budapest

Ballot Box

... I cast my vote for the Sam Browne belt and would like to see the Fair Leather belt brought out of retirement. I heartily agree with Captain Sparks (*August '55, Message Center*) on the worth of the present sword sling; a few hours spent with it on the quarterdeck or in a parade will convince anyone.

I would like to take this opportunity to make a comment, that is worthy of study, on the enlisted uniform. The day is not far away when Blues will again be a required item for every Marine. As a liberty uniform its recruiting value is tremendous — that is, if it is worn. When given their choice, most Marines prefer the service uniform or civilian clothes on liberty. Their biggest complaint against the Blues is that the coat is too uncomfortable in the summer time. The present uniform regulations provide for Undress Blue "B" w/o coat, for wear on sea duty, recruiting duty and commands authorized the Blue uniform as uniform of the day. Why not on liberty? Those of us who are now wearing this uniform daily, know that it stays neat longer and is not nearly as difficult to maintain as the present summer service uniform. There is no question as to which is the better looking, or looks more like a Marine uniform. A Marine on liberty or leave in Undress Blue "B" w/o coat would never be mistaken for a soldier, dog catcher, gas attendant or the many others who earn their daily bread wearing khaki.

Let's put the khaki trousers in the mess hall where they belong, and the blue trousers in the public eye; it would make every Marine on leave or liberty a walking recruiting poster.

1stLT J. O. ALLWEILER

USS Northampton (CLC-1)

Sow the Wind . . .

... Many months ago when Headquarters Marine Corps was concerned with the stagnation of men in the top pay grade I wrote a letter to this column suggesting a more extensive warrant officer program be initiated. Marine Corps General Order 189 established such a program. In another instance I wrote suggesting that the prestige of the staff noncommissioned officer rank could be raised by allowing them to wear the officer-type uniform. Marine Corps Memo 49-55 made this a reality. Now I don't want to imply that my

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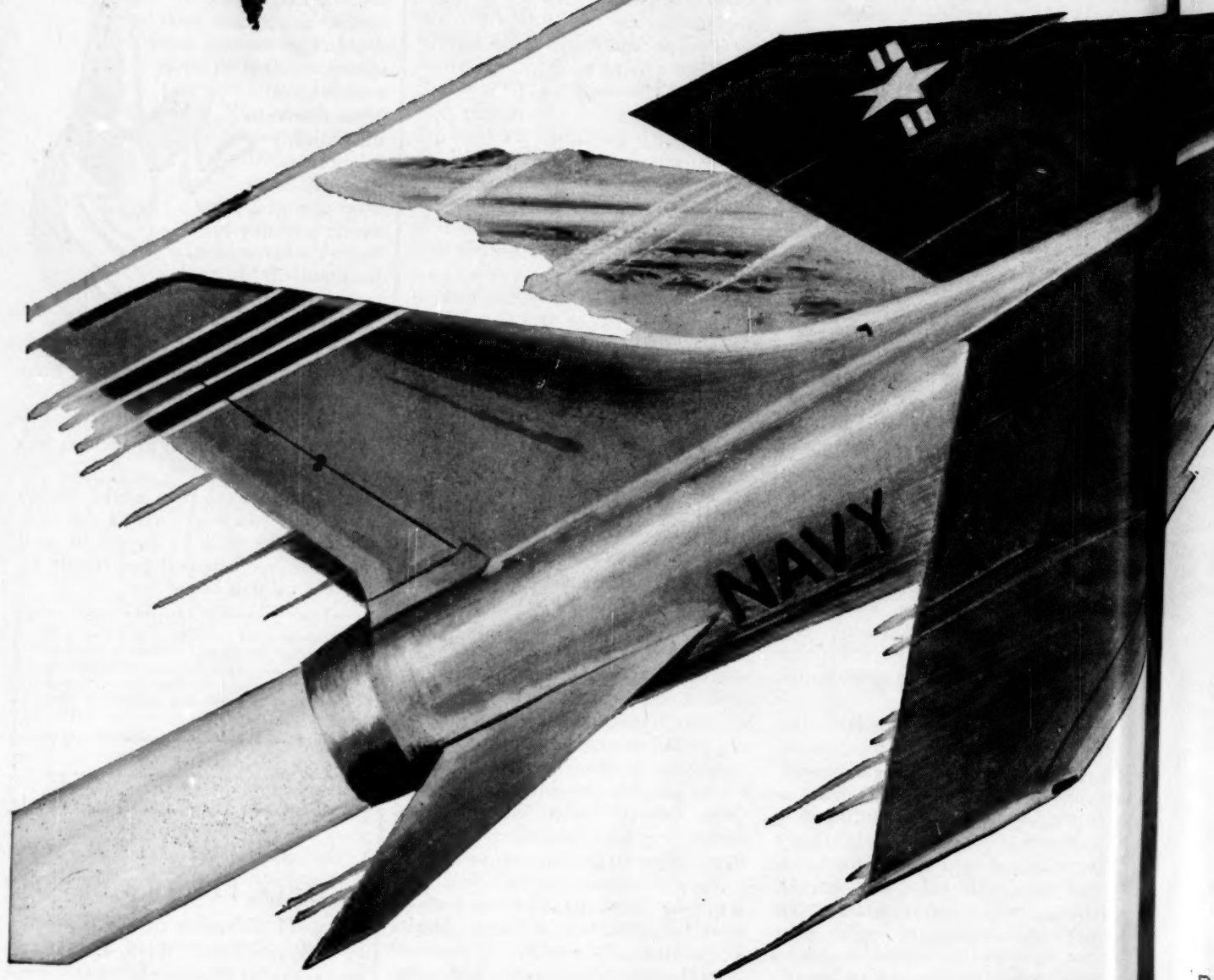
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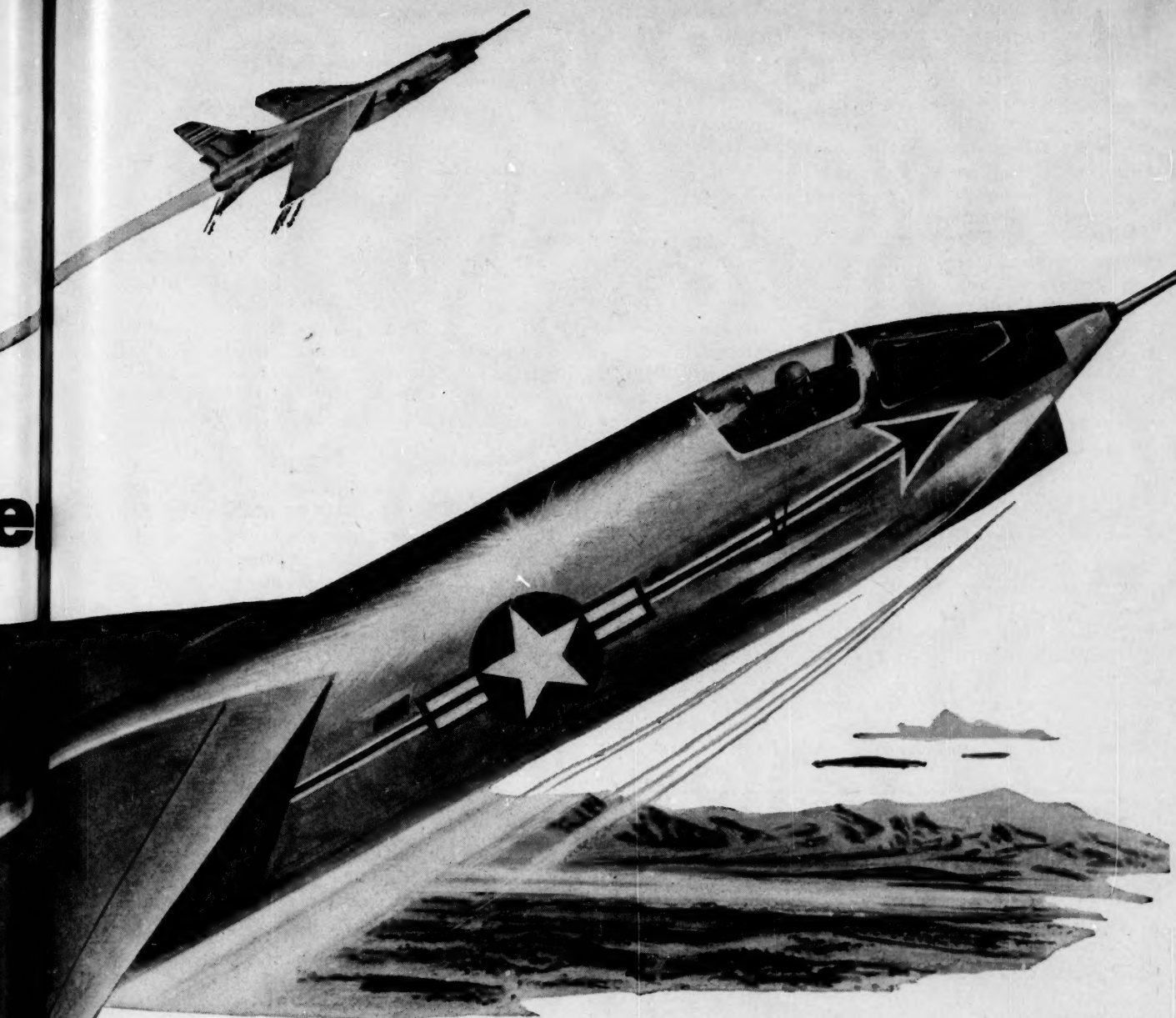
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suggestions were the cause of these two changes taking place. There were many Marines who made similar suggestions. My point is this:

Letters to the GAZETTE do not merely take up space or find their way to the circular file if they are sincere in content. The officers who are in the position to make changes in Marine Corps policy respect and welcome the opinions of other Marines, officer or enlisted. I earnestly encourage all Marines who have new ideas, constructive criticisms and honest opinions to set forth these ideas in writing and forward them to the GAZETTE. They can be assured, if their letters are sincere and reasonable, they will be taken under serious consideration even if they don't always appear in print.

MSGT THOMAS F. KORNER
Newark, N. J.

Religious Conduct

... Fitness reports list, in a very efficient manner, many traits and characteristics which give a cross section of a man's ability, but the most important of all characteristics is omitted—religion.

I do not necessarily mean that a man should be graded on which church he attends or how often he attends it, but

he should be graded on his religious conduct towards his men. Does he advocate the use of religious facilities? Does he urge his troops to attend religious services? Does his moral conduct set the proper example?

It seems odd that leaders of men lack the grit or deem it unimportant to bring religion to the attention of their troops.

The reply of many may be, *it's not my business to meddle in a man's private affairs*. True enough, but how many affairs, private or otherwise, are effectively handled by the use of tact? A gentle shove in the right direction is not necessarily meddling.

I may be as old fashioned as good manners, but I am of the opinion that the all-important thing in a man's life is worship of God.

1STLT ROBERT M. MACDOUGALL, JR.
Ft Worth, Texas

Correction Please

... In my article, *Let's Use Armor*, I should like to point out the following:

(1) Since the article was written, the family of engines concept predicted by Fort Knox instructors appears to have withered on the vine.

(2) Improved tank gun range facilities now exist, with adequate service

practice scheduled for each training quarter.

One other obvious error which should be pointed out (page 53) is that *dependence for carrying vital supplies such as fuel and ammunition should NOT be placed on wheeled vehicles*.

CAPT R. H. PIEHL

3d Mar Div

... Captain Piehl's *Let's Use Armor* advocates putting everything on tracks, short of the galley sink—which is just as it should be if the Marines are to retain their effectiveness under conditions of atomic warfare. Here are a few more suggestions which the Captain might have had in his notes, but left out to limit his article's scope:

1) If armor is to be employed even up to its conventional capabilities, not to mention new uses, all command levels will need considerable additional indoctrination in the use of armor and probably a considerable dose of trust in armor's capabilities. Of course this is what tracked vehicle officers have been crying in their beer for, lo, these many years. Maybe it's about time to listen to them.

2) Isn't the most basic problem that of obtaining from a reluctant Budget Director sufficient funds to provide all the needed armored vehicles and their maintenance supplies? Don't many of the problems outlined by Captain Piehl with regard to poor employment stem from insufficient forces, causing commanding officers to stoop to hoarding—or putting all their eggs in one basket, since there were so few eggs, anyway?

3) If engineer units accompany armor, how about armoring them also?

4) With 105 howitzers mounted in armored amphibians, why not eliminate the towed units? (Assuming extra LVTH6s to replace them, of course.) The main difficulties:

a. Increased maintenance: inevitable anyway under conditions of dispersion required by atomic concept. Better to do added maintenance on fast, protected vehicles than have to replace slower, less protected equipment after their destruction.

5) Antiaircraft artillery mounted in tracked vehicles will be needed not only to make AAA more mobile, but to protect armored vehicles from one of their most dangerous enemies: strafing and bombing planes.

It's fascinating to watch amphibious doctrine grow month by month in the pages of the GAZETTE. For example, in *Hoist the Regiment!* the author advocates mass helicopter movement for the attacking force. Captain Piehl goes a step further, bringing supporting waves

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ashore by 'copter after the initial armored assault.

1st Lt H. P. McLoughlin

3d MarDiv

Retrospect

... *Help Wanted* by Capt J. E. Forde, Jr. (August), could also be a postscript to Col R. D. Heinl's article *A Challenge from Within* (November 1954 GAZETTE). It was the Colonel's suggestion that the MCRD would be a training ground for NCOs as well as recruits. It is interesting to note that both Capt Forde and Col Heinl agree that NCOs should be volunteers to attend DI School! Although in the Colonel's article it was DI School or a Marine Corps Noncommissioned Officers' School. The DI's life may cause a few gray hairs at times but it can also be a challenge to the professional Marine. Next time you say to yourself *I can do a better job than MCRD is doing*—remember the Commandant's letter of April '55.

... *Let 'em Shoot* by TSgt Kelly in the August GAZETTE—Good! And maybe a few more of those 03s for sale would be bought and put to use.

SSGT JACK W. JAUNAL

El Toro, Calif.

... Capt Curtis and TSgt Kelly present two fine ideas in your August issue which ought to be molded into one. Provide a weapon, ammo and a range, and many a Marine will welcome the opportunity to shoot for pleasure.

While stationed near Fort Campbell, Kentucky, I had the opportunity to watch the 11th Airborne Division operate a system akin to TSgt Kelly's. Their pistol range was open on weekends for all comers with .45 and .22 caliber pistols and ammo provided gratis by the government. Their marksmanship program also included weekly and monthly unit shoots with trophies for individual winners. Watching the post paper was enlightening, showing a steady increase in winning scores. The Marine Corps could profit handsomely from a program such as this, especially when you consider the competition the Army, Navy and foreign shooters have presented lately. The Marine Corps' Pistol Team no longer enjoys the mastery it possessed in 1949-50.

The late and renowned shooting enthusiast, General Edson, recently made a plea for more interest in shooting after watching the rising caliber of international competition at the South American shoots. A positive, aggressive program, perhaps modeled after Capt Curtis' and TSgt Kelly's, would be a fine start toward putting some depth behind our world-famous teams.

CAPT P. D. REISSNER, JR.

El Toro, Calif.

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✻ **BATTALION CHAPLAIN OF THE 1ST 90 mm AAA Bn, Lt(jg) Calvin G. Gardner** author of *AWOL* on page 48, was an enlisted Marine during WWII. Inducted in the Corps in 1943, he went through recruit training at San Diego and after finishing he attended Sea School. Ordered to the USS *General John Pope*, Chaplain Gardner spent his two and a half years in the Corps on that ship. Discharged in 1946 he enrolled at Bob Jones University, Greenville, SC. He was graduated in 1950 and attended Northern Baptist Theological Seminary where he received his degree in 1953. During his training at the Seminary he requested a reserve commission in the Navy and received it in July 1953. After completing the Chaplains' School at Newport he was ordered to the 2d Mar Div and from there went to the



CH GARDNER

1st Mar Div in Korea. He gave as his reason for writing his article: "The existing problem of UA in the service today."

✻ **ROTARY AIRCRAFT'S ROLE ON PAGE 14** was written by **Maj Archie J. Clapp**. Major Clapp enlisted in the Corps in 1940 and was commissioned in 1943 as



MAJ CLAPP

a Naval Aviator. During WWII he flew carrier-based fighters in Task Force 58. He attended the Junior Course, MCS, Quantico, in 1946. Thereafter, he flew jets and was assigned to a Helicopter Squadron at Cherry Point before going to Korea. In Korea he served with HMR-161 and was operations officer of VMO-1. Upon his return, he was CO of Headquarters Squadron-37 MCAS, Miami, Fla. and is currently serving on the staff MCDC, Marine Corps Schools, Quantico.

✻ **Capt John E. Greenwood, AUTHOR OF *Career Patterns and Morale* (page 56)**

was graduated from the Naval Academy (1950) and is currently assigned to the English, History, and Government Department at the Academy. He enlisted in the Marine Corps in 1945. Prior to being appointed to the Academy he attended the Naval Academy Preparatory School. He went through Basic School and then spent 2 years with the 8th Marines at Lejeune. He was ExO and CO of Hq Co, 3d Bn, 5th Marines in Korea and upon his return to the US he was assigned to his present duty.



CAPT GREENWOOD

✻ **Captain Carl H. Amme, Jr, AUTHOR OF *NATO Defense College* says "this is a mighty fine school and very few Americans know anything about it."** Now an instructor at the NATO school in Paris, Capt Amme served in Naval Aviation in the Pacific during WW II. In 1948 he became Director of Plans and Operations of the Pacific Division of MATS, and then went to CINCNELM in 1951 as Air Plans Officer. He was Class of '36 at the Naval Academy and prior to his present duty he attended the Armed Forces Staff College. Previous works of Capt Amme have appeared in *Naval Institute Proceedings*, *Stag* and *Bluebook*.

✻ **CURRENTLY A MEMBER OF THE Washington DC, Judo club and the holder of the *Ni-Que* (2d Brown Belt), SSgt Michel W. Mok is the author of *Close Combat* on page 42.** His background in Judo started in 1946 in New York City and continued in the Marine Corps with practice in Japan and Africa. Sergeant Mok is the Washington AAU Brown Belt champion (unlimited class). He joined the Marine Corps in 1949 at Baltimore and after recruit training was assigned to the 2d AmTrac Bn with additional duties as a Judo instructor. While serving at Camp Lejeune he was



SSGT MOK

a member of the camp Judo team. In Korea he was with S-2 and Wpns Co, 1st Bn, 5th Marines. He is now serving as an instructor, Russian Language, MCI. The author gave as his reason for writing his article, "a desire to bring the unfortunate state of individual combat training to general attention and to suggest a solution of the problems."

✻ **Maj William S. Witt author of *Open Fiscal* (page 20), enlisted in the Marine Corps in 1940 and was commissioned via OCS in 1943. He served as adjutant of the 10th Marines on Saipan during WWII. After a short tour of duty at Key West he left the Marine Corps to attend the Harvard Business School. He states as his reason for his leaving and returning to the Corps: "The Business School did not convince me that I desired to enter the business world—**



MAJ WITT

After completing my course of study there and a re-assessment of my aims and desires in life I returned to the Marine Corps." In Korea he was CO Wpns Co, and S-3, 2d Bn, 1st Marines, then Staff Secretary, 1st Mar Div. After a 3-month assignment at Camp Pendleton Maj Witt went to HQMC as Budget Officer, Budget Branch, Fiscal Division and from there to his present job as Aide to the Assistant Secretary of the Navy (Financial Management).

✻ **AN ALUMNUS OF THE NAVAL ACADEMY, 1stLt John W. Kennon is the author of *Live Firing Exercise* on page 39.** After being graduated from the Naval Academy, Lt Kennon attended the 15th Special Basic Course, MCS, Quantico (July-Dec 1952). He was ordered to the Staging Regiment in January 1953 and served in Korea as a platoon commander, mortar officer and as ExO with B-1-5. The Lieutenant is presently serving as ExO, Marine Barracks, Naval Rocket Test Station, Dover, NJ.

✻ **Capt Patrick C. Roe writes on *Organization for Combat Endurance* (page 30). He enlisted in the Marine Corps in 1945 and was commissioned in 1948. He has attended the Electronic Material School (elementary and advanced), and the Officers' Intelligence Course at Ft Riley. Prior to being ordered to his present station with the 3d Mar Div, he was in the Tactics Section, Junior School, Quantico. Captain Roe's experience gained as an S-2 with the 7th Marines at Inchon, Seoul, Chosin and Uijongbu, in addition to research while an instructor at MCS, provided him with the source material for his article.**



CAPT ROE



THREE TELEPHONE PIONEERS from different sections of the country are shown here. They are Robert C. Price of Williamsport, Pennsylvania; Mrs. Marguerite T. Burns of Minneapolis, Minnesota; and Melvin F. Held of St. Louis, Missouri. Shown also are the emblems of the two Pioneer associations.



They're Telephone Pioneers

Experience and fellowship of long-term telephone men and women are important factors in good telephone service

Robert C. Price, Mrs. Marguerite T. Burns, and Melvin F. Held, shown together here, are Telephone Pioneers.

They are representative of the more than 180,000 men and women who belong to two big and important organizations in the telephone business.

These are the Telephone Pioneers of America and the Independent Telephone Pioneer Association.

These two organizations are com-

posed of employees who have spent many years in the business, their average service being well over 21 years. About one out of every four telephone people in the Bell System and independent telephone companies in the United States and Canada is a Pioneer.

Each day the active, working Telephone Pioneers bring over 3¼ million years of "know-how" and experience to the job. Equally important is their

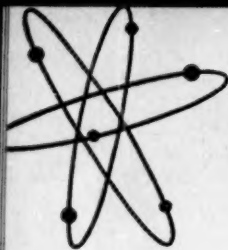
spirit of service that is so important a part of the telephone business.

By sustaining and nourishing this spirit, they help to insure its continuance and provide a solid foundation for greater progress to come.

The fast, courteous, low-cost telephone service you enjoy today is due in no small measure to the men and women who wear the proud emblems of the Telephone Pioneers.

BELL TELEPHONE SYSTEM





In a future war dominating areas is going to count more than capturing or maintaining positions. We should not talk about fighting the "main battle" on some river line.

The "main battle" concept is out-of-date. We want to develop a new principle of offensive fluidity of force — to operate like a swarm of bees, not a battering ram.



NEW WARFARE— NEW TACTICS

By Capt B. H. Liddell Hart

WHEN THE NORTH ATLANTIC Treaty Organization and the Supreme Headquarters, Allied Powers Europe were originally established in 1950-51, the prevailing idea was that the planned build-up of the Western land forces and their tactical air forces would provide an adequate defense against a Russian invasion without recourse to nuclear weapons. But that idea has gradually faded, and it is now commonly assumed that no effective defense can be possible without using such weapons. The heads of SHAPE declared last year that "we have reached the point of no return as regards the use of atomic and thermonuclear weapons in a hot war" — and explained this conclusion by saying: "We cannot match the strength that could be brought against us unless we use nuclear weapons."

This conclusion, and consequent action, entail a greatly increased risk that civilization would be de-

stroyed in the effort to defend it. It is, therefore, worth going deeper into the question of the possibilities of effective defense without using such suicidal weapons.

Examination of German experience in 1944-45 is far more encouraging for the members of NATO than is apparent from the surface of events—and all the more so because the ground and air odds against the Germans at that time were much worse than the NATO forces now face. These have a better chance of successful resistance than is recognized—if the tactics of mobile defense, by delaying action combined with riposte, are properly understood and applied.

In analyzing the Normandy operations of 1944, and the forces on either side, one finds that Allied attacks rarely succeeded unless the attacking troops had a superiority in strength of *more than 5 to 1*, accompanied by domination of the air—

which at least doubles the value of attacking ground forces and, in some staff calculations, has been reckoned as trebling it.

On the British front the most striking case of all was "Operation Bluecoat"—the attempted break-out southward from Caumont on 30 July. Here the stroke was so well-conceived, and the westward switch from the Caen sector so well organized, that it succeeded in concentrating and launching two specially strong army corps against a 10-mile sector held by only two weak German infantry regiments. The attackers' superiority in fighting units was nearly *10 to 1*, and in number of troops was more than that. Being backed by air supremacy, the real measure of our advantage must be reckoned as at least *20 to 1*, and may well be reckoned as *30 to 1*. Moreover, a total of well over 1,000 tanks were concentrated, in this case, on a sector where there were no German

tanks in the earlier phase of the battle. Yet the massive blow failed to overcome the thin defense except on the western part of the sector, and even there it was checked on the third day when meager tank reinforcements began to arrive on the German side. And it suffered continuous checks during the days that followed.

What is the meaning of such a sequel to a very ably planned attack? There are only 2 apparent explanations: (1) that defense in itself had a much greater superiority over attack than was ever realized; or (2) that the attacking troops' combat performance was inferior to that of the defenders. The alternative explanations need to be examined, and the operations investigated more deeply than has yet been done.

The course of the Allied campaigns from Alamein onwards has had a misleading influence on the common run of thought by being an unbroken "advance to victory," punctuated only by halts and checks (except for the temporary reverse in the Ardennes, December 1944). It has fostered a double illusion in superficial minds: that attack proved superior to defense in World War II; and that the Allied troops were superior to the German.

The Ratio of Forces

If the attacking side requires even a shade of superior strength to overcome the defender — a mere 11 to 10 — such a requirement really shows that, materially, defense is superior to attack.

This simple issue, and test, has been confused by cases where an attacker inferior in strength has (a) met a defender much weaker in morale; or (b) had space for maneuver, and the skill to exploit it. Military thought, in treating the question of attack and defense, has not yet learned to discriminate clearly between offensive maneuver and direct attack.

The Imperial General Staff, however, showed a notable growth of realism when, after 4 years' war experience, they issued a new "Umpiring" manual for use in training which laid down that, to succeed in an attack, a 3 to 1 superiority of strength was normally required. This calculation corresponded to the ratio deduced from the experience of

World War I and set forth in the British Official History, and also that which the German General Staff had taken as a working guide between the wars. The question remains whether a 3 to 1 ratio fully represents the basic superiority of defense over attack in the light of World War II experience.

The Normandy operations have all the more lesson-value because, here, the front allowed little room for maneuver until after the breakout. They were, thus, an unusually clear test of the relative strength of attack and defense. Their results show the attack's need for a superiority much higher than 3 to 1. But *how much* higher is a more difficult matter to determine. For here the attacking capacity of the attacking troops is brought into question, and we have to examine the alternative explanation of our repeated inability in Normandy to overthrow the enemy decisively even when we had a ground-and-air superiority of 10 to 1 and upwards.

Combat Performance

In deepening study of the operations it is disturbing to find how poor was the performance of the attacking forces in many cases. Time after time they were checked or even induced to withdraw by boldly handled packets of Germans of greatly inferior strength. But for our air superiority, which hampered the Germans at every turn, the results would have been worse. The attacking forces seem to have had too little initiative in infiltration, and also too little determination — with certain exceptions. Repeatedly, big opportunities were forfeited because crucial attacks were stopped after suffering trifling casualties. That was particularly marked with the armored formations. Moreover, it is all too often evident that a "divisional" attack was in fact merely carried out by a tiny fraction of the available strength, and that the real burden was borne by a few squadrons or battalions. Backing up was poor and slow.

Contrary to the experience of past wars, the deficiency seems to have been more on the lower levels of command than on the higher. Montgomery and Dempsey came out of such an examination remarkably well. The corps and divisional

commanders do not come out of it badly on the whole, with certain exceptions, although it is evident that they were slow in their reactions as compared with their opponents. The main weakness seems to have been on the brigade and regimental levels.

What were the causes? Among those suggested in discussion on the subject, are:

(a) General war-weariness.

(b) The prevalent feeling that the end of the war was near, and thus a naturally increased reluctance to getting killed needlessly. (The Germans had more reason to fight desperately.)

(c) The immense Allied resources in mechanical weapon-power, inducing a tendency to "let the machine win the battle" as it was sure to do in the end — rather than take risks. (The Germans being short of such resources, had to depend far more on their own efforts.)

(d) The fact that a large proportion of the most vigorous commanding officers, and potential ones, had become casualties earlier. (But in this respect the Germans had suffered a still heavier drain.)

(e) A decline in the quality of NCOs, through the wholesale promotion to officers of those who showed power of leadership. (The German Army was more careful to maintain NCO quality.)

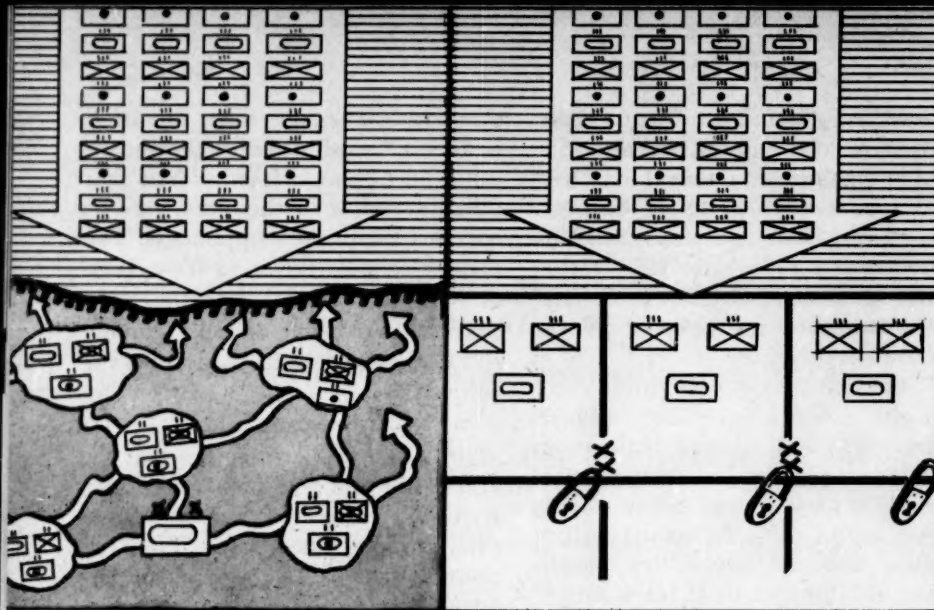
(f) A failure of the training system to develop bold and resourceful leadership.

(g) The ill effects of side-tracking, before or early in the war, of the ardent and experienced tank leaders who had shown most grasp of armored mobility — and who were best qualified to bring up a new generation in the faster operational tempo required.

(h) A national decline in boldness and initiative — from decreasing vitality or increasing domestication.

(i) A growing reluctance to make sacrifices in attack as compared with defense — this is a general tendency in people as they become more civilized. (German reports, while often remarking the failure of the British troops to exploit gaps, emphasize their continued stubbornness in defense and the difficulty of shifting them once they had dug in.)

It is vitally important for future



Eastern Front 1944-45: examples of the employment of a flexible chain of small groups compared to direct support of delimited infantry formations

guidance to establish the causes, and gauge their relative importance. That will not be easy. But the essential first step towards their investigation is to get out of the rut of complacency produced by the finally victorious course of the war. Armies have always suffered worse in the long run from victory than from defeat—for victory lulls them to sleep, instead of spurring them to pursue new ways of progress.

Ten years have passed since the war ended, yet the significance of the comparative odds in Normandy, in relation to the results, has never been adequately brought out in any official report, history, or training manual. There has been too much glorification of the campaign and too little objective investigation. The detailed accounts of the campaign hitherto produced have been "missing the wood for the trees."

In the light of the basic data already brought out, it is evident that the resistance capacity of an efficient and determined defense has been underestimated, and is potentially greater than has yet been recognized in staff studies or military doctrine. So there is much value to be gained from a closer study of the defense mechanism in the 1944-45 battles, and of the technique which the Germans applied.

Defense Technique

The German defensive tactics in Normandy, and later, were a blend of static defense with dynamic defense by dispersed battle-groups—making sharp "finger-thrusts." These repeatedly checked the Allied col-

umns and brought them gradually to a halt, not usually on any pre-chosen line. (We still talk about fighting the "main battle" on some river line. The "main battle," it seems to me, is an out-of-date concept.) By contrast with the effect of the multiple finger-thrusts, the German attempts at concentrated counterattack failed repeatedly, and almost invariably, under Allied air and artillery action.

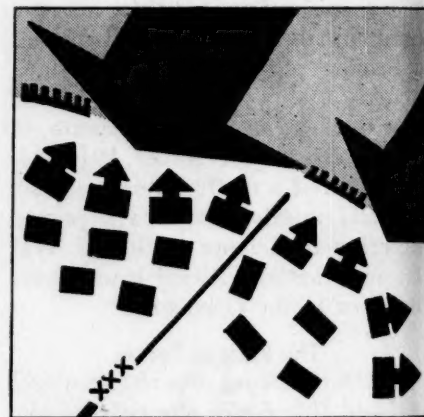
On the Eastern Front, the Russian attacks had still higher ground odds, though less air strength. There, again, the attacks were repeatedly held up unless they had ample space for outflanking the defense. Another point which emerges is that the German defense was most effective whenever it could throw the Russians out of their stride—and least effective whenever the Russians were able to mount a *deliberate* attack, particularly an attack on a river line. One finds, too, that a Panzer division, even a weak Panzer division, often successfully covered a 20-mile front against heavy odds for weeks on end, giving remarkably little ground.

Such analysis suggests that prolonged resistance can be produced, even with the present numbers in the North Atlantic Forces, provided new tactics and tactical organization are developed. What should be the pattern?

In 1940 the West was overrun, and the course of history changed by the German armored forces applying a new blitzkrieg technique of swiftly maneuvering concentration, exploit-

ed by deep strategic penetration. Guderian, the creator and leader of these "Panzer troops," has generously stated in his memoirs that their organization and technique were inspired by my theories and writings of the 1920s. But in the 1930s I came to see how this revolutionary technique could be countered by a new defensive one. Unfortunately, it proved difficult to induce the French and British General Staffs, either to recognize the power of the new offensive technique or, to develop the countertechnique.

Brilliant as was the performance of the German Panzer forces in 1940, and tremendous as were its results, they were only made possible by the Allies' incompetence and their weakness in the air. In particular, the *concentrated* action of armored divisions was *potentially* out of date by



Piecemeal distribution is different from...

the time it was so successfully put into practice. It is now definitely out-of-date. There is fatal folly in dreaming that armored divisions can operate in mass and deliver concentrated punches under an enemy-dominated sky or in face of atomic weapons.

Fluidity of Force

We need to grasp the principle of "fluidity of force" in contrast to the old and obvious interpretation of "concentration"—and to develop a new technique of *controlled dispersion*. The embryo was contained in German practice during the later years of the war. Indeed, it had been conceived in Britain before the war and practiced by the pioneer tank brigade under Hobart in the trial exercises of 1934.

On the Russian front in 1944-45

the Germans often achieved an amazingly prolonged resistance, against much superior numbers, with armored divisions that were flexibly spread in small combat groups on a wide frontage—20 miles or more per division. The composition of such groups was usually a battalion of tanks, a battalion of mechanized infantry and an equivalent artillery unit of self-propelled guns. The units were nearly always below strength.

On the Western Front, too, remarkable delaying and defensive power was produced by similar groups, which in many cases, were even smaller. Often they were composed of a tank company, a mechanized infantry company and a battery or two. The tiny scale of such groups was dictated not only by the scanty strength available to cover

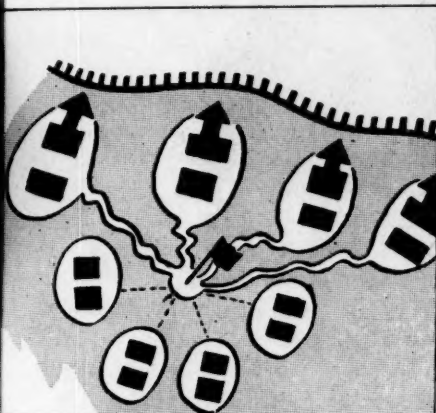
be brought together, to make a concentrated punch, if opportunity arises and conditions in the air permit.

Controlled dispersion is basically different from distribution piecemeal. Little groups thus directed can have multiple effect while not offering concentrated targets to the air. A swarm of bees do not concentrate—they attack you from all directions simultaneously. That is “multiple effect”—and should be our guiding idea in applying tactics of controlled dispersion. That kind of multiple envelopment was seen even in Napoleon’s campaigns. It was only in his later years that he concentrated before a battle. Earlier he used to keep his numerous small columns coming in from all directions, and they hit the enemy from all directions, each reacting on the other.

The aim of the new tactics must be to *paralyze* the enemy’s action. The slogan of “destroying him” in battle leads to self-exposure, self-pinning and the risk of being smashed. Dominating areas is going to count more than capturing or maintaining positions. We want a new principle of “offensive fluidity of force”—to operate like the sea or a swarm of bees, not like a battering ram. Even in 1940 the decisiveness of the Panzer thrusts of Guderian lay in producing paralysis after

penetration, not in producing destruction of the enemy’s forces in battle. It really eliminated battle. In Africa, Rommel applied such new methods offensively *and* defensively.

More consideration, too, should be given to what I would call “preparatory tactics and strategy.” One lesson of the war that emerges clearly is the Russians’ susceptibility to the unexpected and to penetrating ripostes. In developing this potential advantage, we have a basic advantage in the fact of being on the spot before any invasion comes, and occupying the ground over which it would advance. That enables us to reconnoiter routes beforehand for counterthrusts so that they can be made almost entirely across country. We can also go farther than reconnoiter routes. We can prepare those routes, having thought out our moves. We can clear gaps in obstacles so as to make cross-country movement more possible. We can place supplies beforehand in concealed dumps so that the counter-attack forces can move with a minimum of transport. The defender, too, has a potential advantage over the attacker in way of preparation for moving across rivers without being “canalized” by the usual bridge limitations. Countermaneuver, properly thought out, has numerous advantages over an invader. USMC



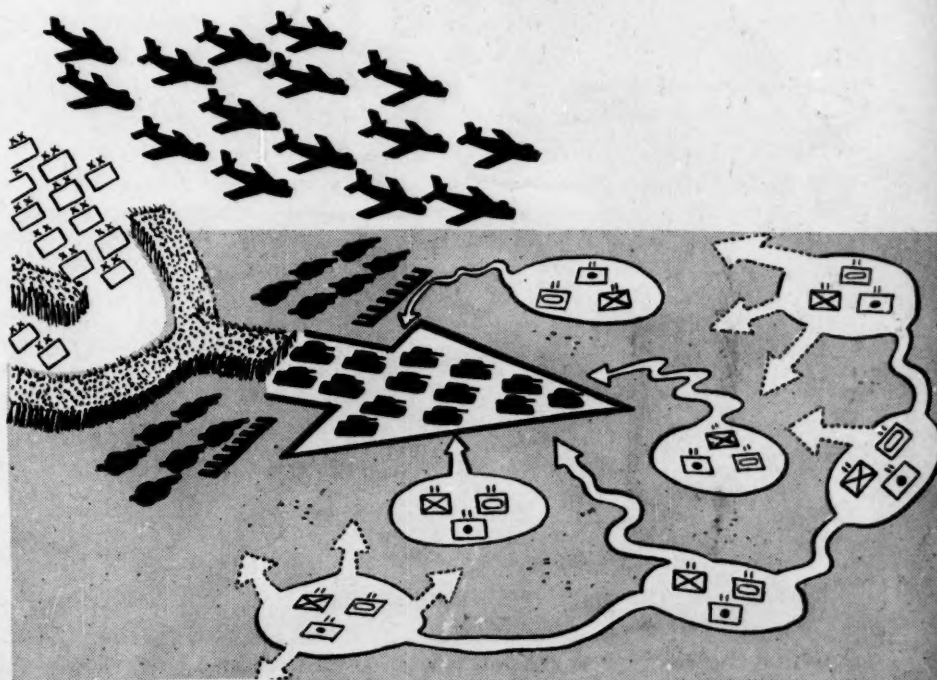
Controlled dispersion, or fluidity of force

the large front but by the better chance they had of evading the ubiquitous and overwhelmingly strong Allied air forces—and by their greater ability to penetrate between the Allied columns and deliver a quick counterthrust at the most effective moment.

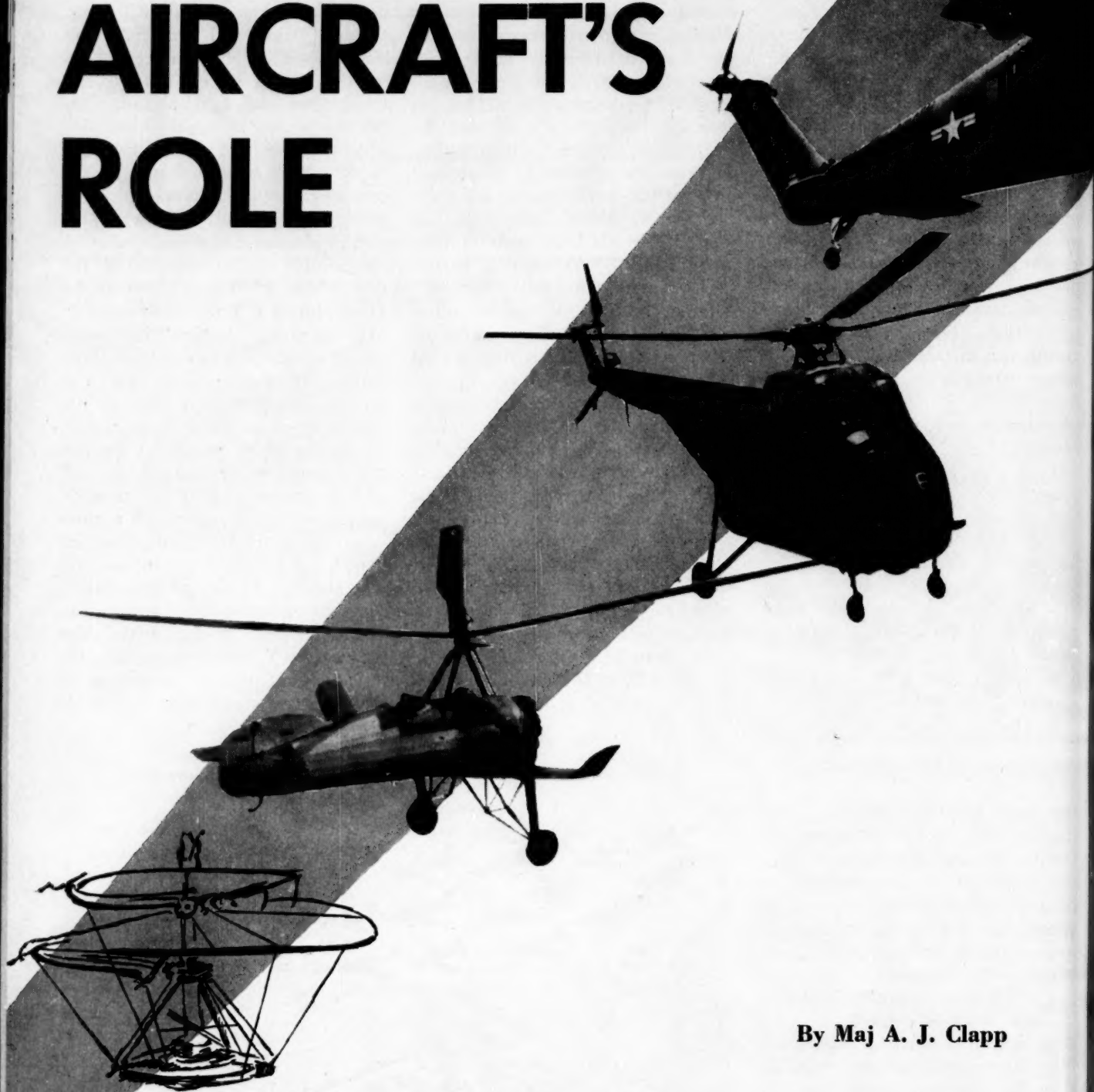
To distribute an armored division in such a flexible chain of small groups, each of them completely mobile, is essentially different from distributing armor piecemeal to support ordinary infantry—and free from the drawbacks of that practice.

The present overlarge division would become a more “operable” hand if divided into 4 or 5 major combat groups subdivided into a similar number of “fingers,” or minor combat groups, capable of operating separately and practiced in doing so. They could at any moment

The multiple effect: many sharp finger thrusts to counter the massive blow



ROTARY AIRCRAFT'S ROLE



By Maj A. J. Clapp

An early idea of Da Vinci's has been developed into a machine with ten times the speed of a landing craft — one that can be launched while the carrier is under way and can negate the enemy's advantage at the water's edge

IN THIS AGE OF AWESOME nuclear weapons deliverable by sonic-speed bombers, it undoubtedly seems odd that military planners should devote much thought to a slow, unarmed aircraft whose chief attribute is its ability to rise and land vertically. However, as strange as it may seem, the advent of the so-called "Super Weapons" was precisely what brought about this marked growth of interest in the inelegant helicopter.

Even though the rotary-wing principle dates back to an idea of Leonardo da Vinci in the early 1500s, no great strides were made in this field in the US until 1939, when a helicopter was successfully flown. Shortly thereafter, the Armed Forces began spending money on helicopter development, visualizing their use strictly as a rescue and life-saving device.

It was not until "Operation Crossroads," the Bikini atomic weapons tests in 1946, however, that the services fully realized the potential value of this aeronautical infant. At that time, it occurred to some officers of vision in the Marine Corps and Navy that the operation was especially well named; for a crossroad had definitely been reached in regards to amphibious planning.

The great armadas which had characterized amphibious assaults in WWII would now present an extremely tempting target to an enemy with the atomic capability. Accordingly, a number of military men voiced a strong opinion that amphibious warfare was no longer feasible in the face of this threat.

To add to the appeal of that particular stand, there were others who believed our possession of the Bomb erased all necessity for conducting amphibious operations in

the future. Simple logic will indicate why that dictum was utterly ridiculous and unacceptable.

A glance at a world globe will show that more than two-thirds of the earth's surface is covered with water. Militarily speaking, what that means to us is this: vast expanses of water lie as a barrier between us and any potential enemies of the foreseeable future. (Needless to say, the distance barrier serves our possible enemies as well as ourselves). To surmount this barrier and exert our military strength against the enemy beyond—whether the operation be launched by land, sea, or air—we must have advanced bases from which to operate.

Many of these bases are in our hands, or in the hands of our allies. But others—some of vital strategic importance—must be seized from the enemy after the commencement of hostilities. The National Security Act of 1947 assigned responsibility to the Marine Corps for readiness in this regard, so steps were taken to determine means of fulfilling our obligation in spite of the atomic threat.

As was mentioned before "Operation Crossroads" pointed out the obvious vulnerability of fleet formations we had grown accustomed to using in amphibious assaults of the past. A concentration of ships such as we had standing offshore at Iwo Jima or Okinawa would now be completely covered by the blast pattern of a single nuclear weapon.

One thing was certain: it was inconceivable for an admiral to risk a smashing naval catastrophe by having all his ships that close together in the future. So the first step in the plan, naturally, was to disperse the

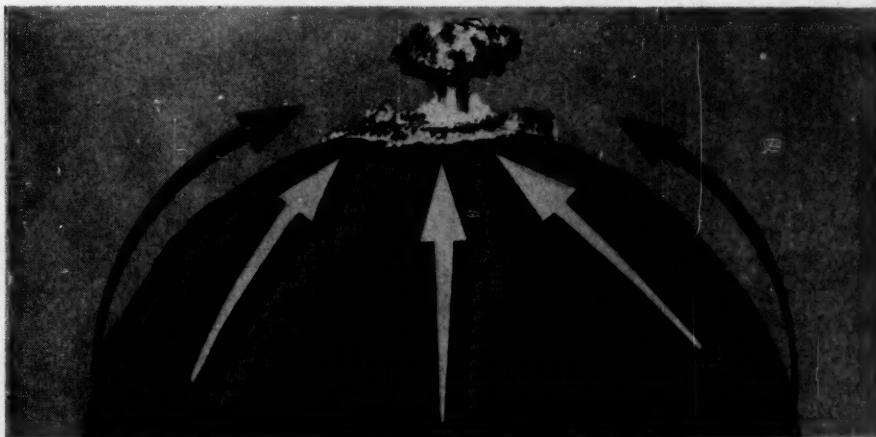
amphibious fleet over a much wider area than had ever been previously imagined. With the ships thus scattered to present a less attractive target, the problem of rapidly getting the troops ashore in strength from a widespread formation had to be solved.

The Marine Corps had been using landing craft with a speed of about 10 knots. After launching them from a dispersed fleet formation, the troops would probably be required to stay in the boats for a period of several hours. That, in itself, was a sizable handicap; but worse yet, in order to achieve a concentration of strength before meeting the enemy at the beachline, the craft would have to be brought together in a mass just offshore. That would then result in what the planners had been trying to avoid all along: concentration of the attacking force while a gap existed between it and the defenders.

That last statement brings to light a peculiar feature of combat in the Atomic Age. Heretofore, a commander could feel reasonably secure only when there was separation between his force and the force of his opponent. Now the situation is completely reversed.

As long as distance between forces exists, either commander can feel free to strike with nuclear weapons without endangering his own men. Therefore, the safest place for a large troop concentration—relatively speaking—is at close quarters with enemy troops. This restricts the opposing commander to use of conventional weapons.

Considering the previously mentioned factors, it was decided the





Landing craft — the assembly area is vulnerable
Helicopters — carriers can be far out and dispersed

amphibious assault must be waged essentially like this: maintain wide dispersion within the amphibious fleet, then bring the attacking troops together rapidly at the point of enemy contact. Thus a delicate balance must be achieved between premature massing of the troops, yet assuring the compounding of sufficient strength to overcome the enemy positions. Therefore, it became obvious that a definite requirement existed for a ship-to-shore vehicle that possessed much greater speed than did current landing craft.

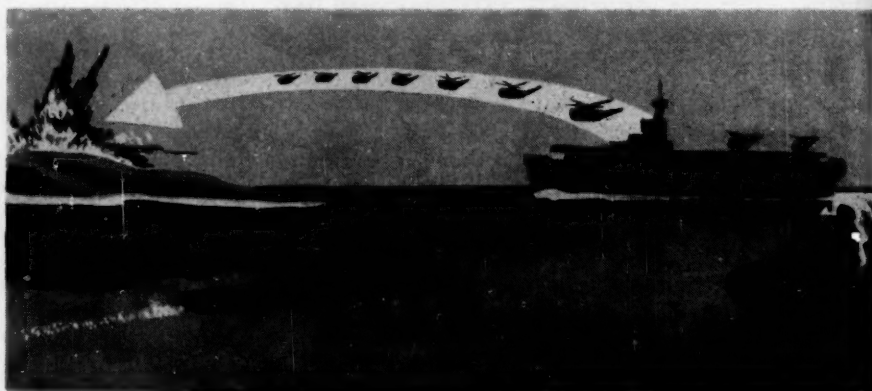
After deciding that a vehicle with adequate speed would of necessity be an airborne craft, it was but a short step to selection of the helicopter for the job. As it turned out, it could hardly have been better suited had it been invented for that purpose.

Here was a machine with a speed roughly 10 times that of landing craft. It could operate from small carriers and could land on practically any type of terrain ashore. The speed advantage of 10 could allow 10 times greater dispersion within the fleet, without extending the time required to assemble the assault troops.

Another advantage of using the helicopter as an assault conveyance is that ships need not be dead in the water while launching them. It is no secret that submarines pose a very real threat at this time; and it should not take a John Paul Jones to realize that a fleet underway is less vulnerable than one at anchor. This holds true for air as well as submarine attacks.

Thus far, consideration has been given primarily to the naval aspects of amphibious operations: the responsibility of bringing troops to the

objective area and providing them with a means of getting ashore. Now we will look at the operation through the eyes of the Landing Force Commander, who must deploy his troops in such a manner as to seize his objective with minimum expenditure of men, time and material.



Sub peril — helicopters can be launched while the fleet is under way — the moving carriers are less vulnerable

The conventional amphibious assault has several inherent characteristics which must be reckoned with. First of all, there is one bit of information the defender can always depend upon: it is axiomatic that if an attack is launched from the sea, the attacker must eventually cross the beach. Realize what that basic truth means to the defender.

All defenses can be centered around one spot: the shoreline. Underwater obstacles can be constructed offshore; minefields can be planted on the beach; pillboxes and bunkers can be placed along the shore; artillery can be emplaced to command the beach and its approaches; and troops can be deployed to repulse the landing.

Also, in the face of this planned

defense, the attacker must contend with his own severest weakness. At the water's edge the attack transforms from a waterborne operation to land warfare. At that point the attacker has absolute zero strength, while the defender is at his strongest. Naturally, this change-over point has always been the most critical time in amphibious operations.

When helicopters are employed, however, the picture becomes brighter at once. Herefore, an attacker had 2 possible plans of action: he could drive straight ahead or circle around the enemy flank. Now he has a third dimension with which to work; he can by-pass fixed defenses and hit the enemy from the rear. This concept is commonly referred to as Vertical Envelopment.

Now the defender can be sure of nothing—he can be hit from any direction, at any time, and with any

amount of troop strength. The mere threat of a helicopterborne attack should force him to spread his defenses much thinner than in the past, which will be some compensation for our own dispersion in the face of enemy atomic threat.

This ability to land in the enemy's rear, perhaps brings to mind the similarity between helicopter and paratroop operations. That is true, there is a similarity; however, we believe the helicopter's advantages far outweigh fixed-wing assault aircraft for many reasons.

The most obvious advantage is range. In all aircraft employment—rotary or fixed-wing—a compromise must be reached between fuel load and payload. This limits the effective range of current fixed-wing



Landing craft — zero strength at the water's edge
Helicopters — beach defenses pose no problems

troop carriers (if they are to haul a worthwhile payload) to short distances in terms of global warfare. On the other hand, helicopters have the same world-wide range as the fleet that transports them. This is because their fuel load need be just enough for a ship-to-shore round trip.

Besides range, there is a very definite tactical advantage attached to employing helicopters instead of fixed-wing transports. As paratroops jump into battle they tend to become scattered, making the problem of control extremely difficult. There were instances during WW II when troops became separated from their units during the jump and did not rejoin it until after the engagement. In comparison, helicopter-borne troop units are landed intact and ready to fight. This permits immediate control by the troop leader over his men during the most critical time during the assault.

And when troops are delivered by helicopter, it is not necessarily a one-way trip. Should the situation dictate such action, the helicopters

could return and move the troops to another tactical locality—or retrieve them entirely. Casualties could be helicopter-evacuated to hospital ships offshore, as they were in Korea. Not only is this concept important from a lifesaving standpoint, it is far more economical than moving a field hospital ashore.

It has been noted that the atomic capability of our possible enemies brought about a new concept in amphibious warfare, but that definitely does not mean they have a monopoly in the field of nuclear weapons. In fact, the balance of atomic firepower is in our favor and should remain so. The value of this firepower is relatively insignificant, however, unless we draw up plans for maximum exploitation of its effect. This is being done.

In the first place, the Marine Corps is chiefly interested in tactical atomic weapons. If the Landing Force Commander is not able to get the blast when and where he wants it, he will probably be better off if he relies upon his conventional weapons. When dealing with these mass de-

struction special weapons, a time-worn phrase has paramount significance: "There is no margin for error." Therefore, in tactical work, the special weapon delivery agency should be integrated closely with all other units so as to preclude the chance of misunderstanding regarding the overall plan and desired effect. The command relationship structure contained in Marine Corps Landing Force doctrine was designed with this in mind.

Just as the enemy's ability to launch atomic weapons against us did not dictate our predetermined defeat, use of such weapons by our forces will not alone spell certain victory. It will still be necessary for troops to move in and exploit the shock and confusion inflicted upon the enemy by the devastating blast.

For maximum effect, this follow-up by our troops should take place as soon as possible after the burst; yet our troops must be maintained a safe distance from ground zero until after the nuclear explosion. To reconcile the 2 factors—troop safety versus utmost effect—we envision helicopter delivery of the attacking force to the blast area immediately following detonation. The tactical soundness of this concept has been proved in the "Desert Rock" exercises.

The Marine Corps is currently equipped with one basic transport helicopter; another to replace it is in the experimental flying stage, and should soon be in production. Others are on the drawing board, but they will be disregarded at this time because they are too far in the future.

The standard transport helicopter in the Marine Corps is the Sikorsky HRS. As a replacement for the HRS, we shall eventually have the Sikorsky HR2S. The HR2S is designed to transport 20 men, but again the number will vary with the distance they are to be transported. It has a speed in excess of 100 knots. It also can be operated from escort carriers.

In order to fit on the aircraft carrier elevators, the tail folds on this helicopter as well as the rotor blades.

That, briefly, is the picture of the helicopter's proper role in amphibious operations—as time goes by, we can expect to place even more reliance on this extremely versatile aircraft.

USMC

Heliotroops — immediate action as the troops land intact
Paratroops — there must be an assembly before the assault



DEMOLITIONS— an infantry weapon

☛ NORMALLY THE INFANTRYMAN gets little or no demolitions training. Occasionally the subject is touched upon in training and at the Infantry Training Regiments, but the average Marine doesn't retain enough knowledge from that brief phase of instruction for future practical application.

In combat areas, especially in a defensive position, comes the everlasting job of digging gun emplacements and trenches. Sometimes this means working in solid rock or frozen ground. Nevertheless, the job must be done.

A request is submitted to Wpns Co or to the Engineers for a qualified demolitionsman. This request can't always be filled so the company commander has to resort to other measures.

A futile effort is made throughout the company to procure a qualified demolitionsman. A couple of men convince the company commander that they are capable, though not officially qualified. Everything goes along fine for a while until one of the men loses his non-sparking metal blasting cap crimpers. Forgetting important safety precautions he borrows a pair of pliers from a communications man. A few charges are prepared successfully with the improvised tool—then finally a spark is produced while preparing a large charge. The demolitionsman is killed and several others in the immediate vicinity are injured.

Consequently an order is put out forbidding the handling of explosives by anyone but authorized personnel.

Trained personnel, with a bit of ingenuity, can improvise a lot of antipersonnel weapons to place in any avenue of enemy approach. Linked machine gun ammunition wrapped around a block of TNT is deadly at close range. Expended or discarded material found on almost every battleground has been converted into useful weapons—a block

By SSgt Arnold C. DeWease

of TNT rigged up in a box of shell fragments, for instance.

Shaped or satchel charges, if placed properly can, and will, completely demolish fortifications. Small satchel charges thrown inside a bunker will neutralize personnel more effectively than a Mk II or Mk IIIA1 hand grenade.

In house-to-house fighting, an entrance can't always be found, therefore one must be made. A pole charge will do the trick if placed in the proper spot. This tactic calls for prompt action. If the infantryman isn't permitted to handle demolitions because he hasn't sufficient demolitions training, and it is difficult to get a specialist to do the job, the advance is held up.

An infantry platoon assigned to a combat patrol or raiding party must be trained for the mission in order to perform it efficiently. If the mission warrants the use of demolitions, a demolitionsman must be detached from Wpns Co and trained for the mission with the rifle platoon to insure teamwork. If the mission is scheduled on short notice the demolitionsman doesn't have ample time to work out with the riflemen—a factor that could effect the efficiency of the mission.

Agreed, every man can't be trained as a demolitions expert with a thorough knowledge of all the engineering capabilities of explosives. But every Marine should have a basic knowledge of demolitions and their safety precautions, at least enough to fire the various types of charges. Most of them are as simple as firing a hand grenade—the big difference is becoming familiar with the vulnerable points. Occasional classes on safety precautions nomenclatures, functioning and operating would keep him familiar with all aspects of demolitions.

With a week of instruction the average Marine can become fairly skilled as a demolitionsman. This doesn't mean however, that a Marine would become capable of performing all engineering explosive requirements. Safety precautions, preparation of charges and their application would be stressed. If these schools couldn't be made available to the average infantryman, they could be held for officers and NCOs, particularly those in the infantry field.

With this training accomplished there would be enough qualified demolitionsmen throughout the Marine Corps to cope with normal situations in combat involving the use of demolitions.

Special schools could be conducted in FMF units, Basic School and NCO schools. Short refresher courses and annual exemption examinations would insure keeping abreast of new developments and eliminate the possibilities of forgetting any essentials.

When Marines need something they don't have that's vital to the successful completion of a mission, it is usually *procured*. The attempt to procure demolitions through a "midnight requisition" by an improperly trained man could cost more than we can afford in loss of lives from negligence and ignorance.

Marines have always had an outstanding reputation for handling their weapons with the maximum of efficiency. Let us tackle demolitions—just as valuable as an infantry weapon—and handle it as efficiently.

With most 0300 Marines trained to handle demolitions, company commanders would no longer have to worry when a situation demanded direct action. The job could be done without the danger of an accident.

Certainly demolitions are dangerous, just as a rifle is dangerous if a man doesn't know how to handle it. Explosives are not only an engineering tool, but a weapon as important to the infantryman as one that launches a projectile. US ☛ MC

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*"Enlist to fly
in the
U. S. Marine Corps"*



Opn "FISCAL"



By Maj W. S. Witt

An over-obligation of a commander's funds places him in the

♣ MARINES HAVE LONG BEEN ACCUSTOMED to operating successfully in the exclusively military fields of tactics and logistics. However, recent developments have presented a new field in which a great many Marines must learn to move with the same familiarity and success — financial management.

Financial management is not exclusive to any business or profession; it is essential to all. It has been essential to the Marine Corps since 1775. Yet, prior to fiscal year 1953, only a few Marines at Headquarters Marine Corps were actually engaged in it.

At that time, field commanders were granted a limited control of funds, for which they were accountable, but they did not budget for the funds, nor exercise any substantial control over them. Fiscal year 1954 saw field commanders with increased control over the funds allotted to them, but it still could not be said that they were involved in financial management. Fiscal Year 1955 however introduced a radical change.

Commanders at many levels and their staffs are now engaged in financial administration under a system of performance budgeting and accounting and an expanded control of funds entirely new to the Marine Corps. Under this new system, they submit to Headquarters an annual estimate of the amount of dollars they require to maintain and operate their organizations each fiscal year, and on the basis of these estimates, they receive funds for which they are accountable and over which they must exert fiscal control. "Operation Fiscal" is on!

What's all this got to do with the bulk of us Marines who are neither in positions of command or staff engaged directly in fiscal action? Plenty! Some of us will one day be commanding officers many of us will be on a staff where we will be confronted with fiscal matters; some of us will find ourselves in a fiscal section of a large command. And don't think for a minute that the "Old

Man" is going to let you forget about the dollar value of that 782 gear being used! He has to pay for it out of the funds he is managing! Therefore, it behooves us all to learn something about the financial action in which we are going to be engaged during "Operation Fiscal" and to become acquainted with financial terms and concepts. Financial administration is now a function and responsibility of command and an integral part of all staff planning!



Reasons for "Operation Fiscal"

Most humans need to know the "reason why." While Marines are not entirely similar to the rest of the human race, they *are* similar in this respect. Many will say that the Marine Corps has done real well up to now without getting everybody in the fiscal act and ask why we should suddenly become involved in all these changes. There are at least 2 pretty good reasons:

In the first place, Title IV, National Security Act, requires a reorganization of fiscal administration in the National Military Establishment to promote efficiency and economy. A change to Performance Budgeting and Accounting by the Marine Corps further implements the law.

Secondly, the Commandant of the

Marine Corps believes that by decentralizing fiscal administration, by involving more Marines in the use and control of funds, a more efficient use will be made of the resources available to the Marine Corps. Moreover, he wants commanders to have a financial control comparable to control in other areas of responsibility; he wants financial responsibility to parallel command responsibility. Further, he expects more realistic and accurate data for budget purposes when it comes from the field, where the money requirements are generated.

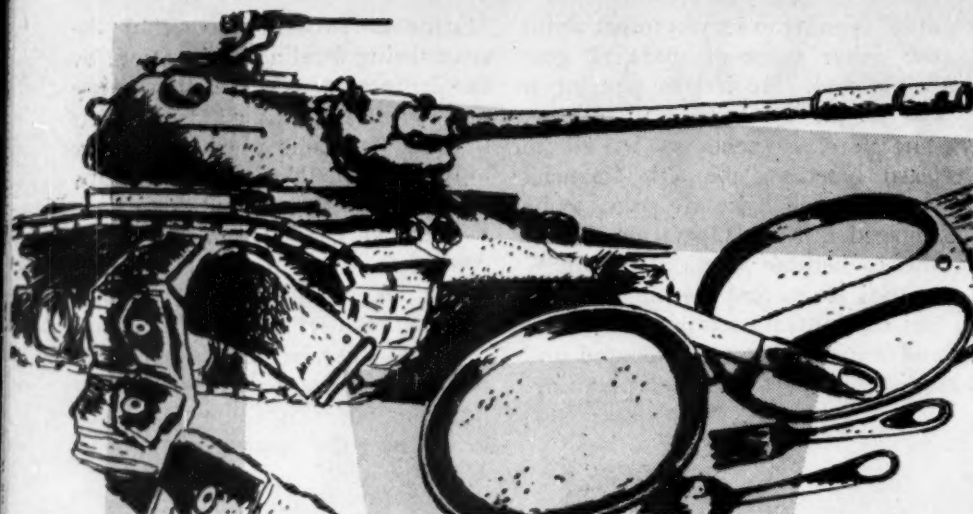
Performance Budgeting & Accounting

A budget is the financial or dollar expression of the personnel and material objectives of an organization. It is a plan of financial action during a fiscal year. The plan describes the number of dollars anticipated for expenditure opposite the items or functions for which the dollars are to be spent. The new Performance Budget is no different from previous Marine Corps budgets, insofar as it is defined as a plan for financial action. However, it is different as to what the dollars are planned for.

Previous Marine Corps Budgets planned expenditures on the basis of "end items;" like spare parts, brooms, cartridge belts, swabs etc. It merely listed all the "things" the Marine Corps planned to buy and estimated their cost. The accounting procedures then recorded the cost of the "items" or "things" which had been purchased. The budget did not tell what the Marine Corps planned to spend nor did the accounting system reveal what *had been spent* for such Marine Corps "functions" as unit training or recruiting. Field commanders did not have a system whereby they could determine the cost of the daily operation and maintenance of their organizations.

Under the new system of Performance Budgeting and Accounting, the costs, for items (spare parts, lumber, cartridge belts, swabs, meat can covers etc.) are aligned, not as before, but according to their use, under the functions for which they are being purchased, as a cost of that function. Cartridge belts used in training at the San Diego Recruit Depot are charged to a Marine Corps function — individual training; lumber pur-

position of having broken the law



chased and used at Camp Pendleton will be charged to a function—unit training and operations; labor, instead of being listed as just another "item" of expenditure, will be charged to functions like individual training, unit training or security and service operations at Marine Barracks and other units providing security and service functions.

The inevitable question now arises as it always does in the face of something new—is this new thing better than the old? Is this functional "end use" or Performance Budgeting and Accounting System superior to the old or "end item" method? The question can probably be resolved by answering another more specific question: How much does it mean to the Marine Corps to know that it bought "umpty-ump" less dollars worth of lumber, tentage or any other list of "items" in the fiscal year 1954 than it did in fiscal 1953? Not much!

The Marine Corps is *not* in the business of buying and selling lumber, tentage or anything else. It is in the business of training and operations. The fact that more or less lumber is purchased will contribute to information which will tell how much it costs to run the Marine Corps, but doesn't tell much about the cost of the various functions within the Marine Corps. However, by relating items like lumber and tentage to minor functions like station operation and maintenance at a recruit depot, and gathering these and other recruit training costs under the larger function of recruit training, it can be determined how much it is costing the Marine Corps to train recruits. When the Marine

Corps can tell what it has cost to train recruits at Parris Island and at San Diego for fiscal years 1955 and 1956, then it is in possession of facts with meaning. The Marine Corps then has a basis for comparing the dollar efficiency of 2 years' operation or of 2 recruit depots. There is a goal at which to shoot: The lowering of those costs with no loss of training efficiency! Under the old "end item" method, the goal could only be to try and spend less for items like lumber or tentage in the Marine Corps for a given year. This is obviously not a good goal because it would be difficult to determine at what bases or organizations the expenditures should or could be less.

Field Commanders Fiscal Action

Every military operation must have a plan and every plan is predicated on an estimate. "Operation Fiscal" also requires an estimate and a plan.

By 30 April of each year, commanders of FMF units, posts and stations, supply activities, ships' detachments and barracks are required to submit to Headquarters Marine Corps, annual estimates of the funds they will need to operate and maintain their commands for ensuing fiscal years. In a small command, like a ships' detachment or a small barracks, the commanding officer by himself or with the assistance of his ExO and a couple of his staff NCOs, may personally prepare the annual estimate. However, in large commands, the CO has a staff capable of preparing the financial estimate for him. The members of his staff who are concerned with the various functions within his command pre-

pare their portions of the estimates under his direction and the co-ordination of the chief of staff or another staff member designated for the purpose. These estimates and/or those of subordinate commands are combined into a single set of estimates, which when approved by the commander are submitted over his signature to the Commandant. The Commandant subsequently grants an allotment of funds to the CO on the basis of his estimates. When the commander receives his allotment, the estimate upon which it was based becomes his budget or fiscal plan; the estimate having set forth, in detail, the amount of money estimated to operate each function or performance within his command.

In large commands, the CO may have a fiscal section to consolidate and prepare his annual estimates, as constructed by subordinate commands and/or his staff, for submission to HQMC. This section may contain an officer and some NCOs, who, throughout the fiscal year, maintain the record of money obligated and expended against the commander's financial plan.

The Commander's Estimate at HQMC

When the field commander's estimates reach HQMC, they are evaluated by the Commandant's staff. Upon completion of the evaluation, the annual estimates of all commands are consolidated into the Marine Corps Budget Estimates which provide for the operation and maintenance of the troops and all facilities of the Marine Corps. This budget estimate is presented to the Congress through a series of reviewing agencies: Department of the Navy, Department of Defense and Bureau of the Budget. At each reviewing agency, the members of the Commandant's staff concerned with the budget must defend the budget estimate by justifying the dollar figures and the functions or performances which they represent. When Congress is satisfied with the estimates, it votes an appropriation of Treasury money for the Marine Corps for the operation and maintenance of its activities. This appropriation has the descriptive title "Marine Corps Troops and Facilities." There are other appropriations for the Marine Corps; (Military

Personnel, Marine Corps Reserve — for pay, allowances) but this is the one for which field commanders estimate fund requirements and from which they receive their funds.

After the Congress has appropriated Treasury money to "Marine Corps Troops and Facilities," and the President has signed the appropriation into law, the funds are apportioned among the fiscal quarters by the Bureau of the Budget, thus determining the amount which may be spent each quarter. (The apportionment by the Bureau of the Budget is based on recommendations by the Department of the Navy and the Department of Defense.) The funds are then allocated by the SecNav to the various budget activities and, finally, released to the Marine Corps. The Commandant then allots the funds to the commander in the field. (The appropriation is subdivided into several parts, called activities for easier administration and understanding of the budget context, viz, a) Training and Operations, b) Depot Supply System, c) Transportation of Things, d) Marine Corps Reserve Training, e) Cataloging, f) Industrial Mobilization, g) Departmental Administration.)

The commander may commit the funds, according to the purpose of the allotment, as his judgment dictates. He is not irrevocably tied to his budget to the extent that he must spend his funds just exactly as he had outlined in his estimate. In other words, his budget, like all good plans, is flexible. A division commander, for example, finding that his estimate of funds for General Supply Materiel is in excess of his needs, may use those funds for another portion of his budget where his estimate proves to be inadequate; Engineer Materiel perhaps. The Commandant, insofar as possible, is permitting an autonomous administration of funds by his field commanders just as he does in other areas of command.

Each commander of a major command, upon receipt of his allotment, will doubtless parcel his funds out to his subordinate commanders or department heads by sub-allotment or planning estimates. The department supervisors or subordinate commanders will actually then obligate and expend the funds for the func-

tion they head. Subordinate commanders may even further parcel their funds by a planning estimate to organizations close to the actual users of the gear and services the funds purchase.

In any case, you may be sure that most Marine commanders are not going to parcel out all of the funds they receive. They will retain some of their funds as a reserve against a contingency. A reserve in a tactical situation is no new thing to Marine



commanders. They know that it is essential to the commander as a means of controlling and influencing the tactical situation. The fiscal action is not different from the tactical action in this respect. The commander will want a monetary reserve to apply to a function within his command which may run short of funds or to cover a situation which he was unable to foresee.

As each commander receives his funds, establishes his reserve and distributes his funds among his subordinates for obligation and subsequent expenditure on the necessary functions of the command, he will need a reporting and accounting system to control the use of the funds. There is a basic accounting system which is required by HQMC, but beyond the basic requirements, the system may vary somewhat with each commander. However, all systems will have the same objectives, i.e., 1) the efficient, legal and economical use of the funds and 2) the insurance that the obligation of the funds does not exceed the amount of

funds available. Each commander will be very diligent in this last respect. *An over-obligation of his funds places him in the unenviable position of having broken a law, which makes him liable to legal prosecution!*

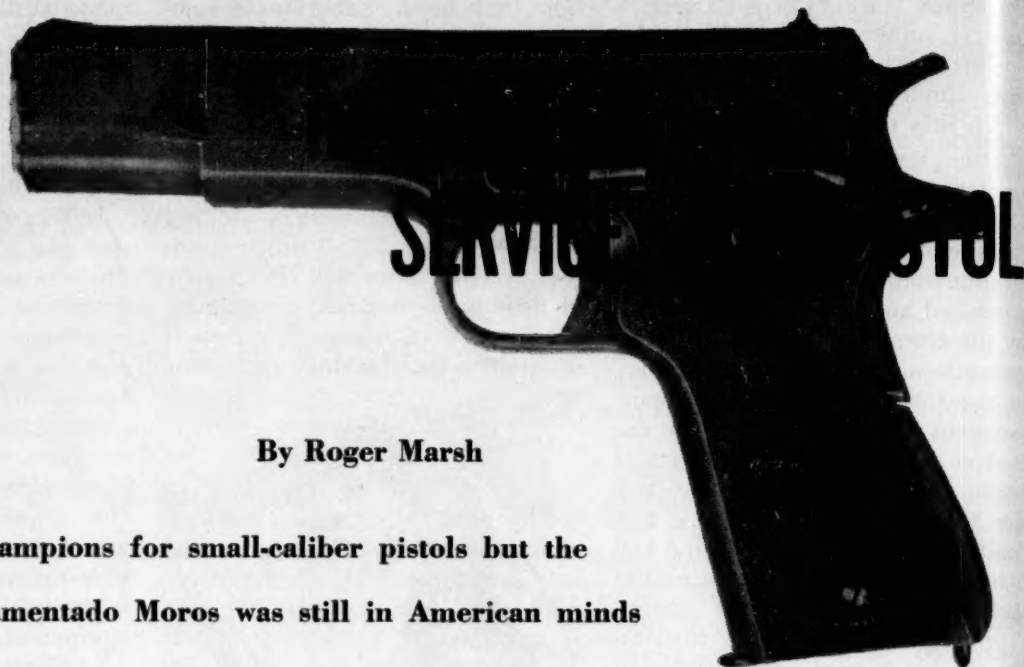
In short, the "Old Man" is on the spot and it's up to every Marine in his command to appreciate this and co-operate in the conservation of equipment and services and in all economy measures. Failure to co-operate may lead the commander to obligate his funds dangerously close to a zero balance in order to have his command adequately equipped. *Don't force him into a position where he may even approach an over-obligation in an attempt to counteract carelessness in the use of equipment and supplies. Don't forget that the "Old Man" is paying for that cartridge belt and that canteen; he's buying that swab, those pencils and that paper; he's purchasing those replacement parts and paying the civilian labor working aboard the post.*

Every Marine Is Engaged in "Operation Fiscal"

Marines have always been noted for their ability to do the most with the least. The commander and his officers and NCOs are going to be after the individual Marine to make doubly certain that he lives up to that reputation. Such action should be no cause for mystery once the implications of this new fiscal system are realized. The mere fact that a Marine is using gear and consuming supplies puts him into the fiscal action. It makes him just as important and vital an element of the fiscal operation as when, in a combat operation, he is a member of a fire team, squad, platoon or a support section.

Many NCOs and officers are going to be engaged in fiscal administration. They should, therefore, be as assiduous in applying themselves to the task of accumulating knowledge in connection with the staff planning and execution of financial matters as they are in the other aspects of their profession—if they expect to achieve success. "Operation Fiscal" is a full-time operation which will continue as long as money is required to operate and maintain the Marine Corps!

USMC



By Roger Marsh

There were champions for small-caliber pistols but the memory of juramentado Moros was still in American minds

RECENTLY THE UNITED KINGDOM and Canada concurred in the US decision to declassify the military characteristics for a new pistol, which means that the old faithful Automatic Pistol, Caliber .45, M1911 and M1911A1, may be coming to the end of the trail. Some will cheer, some will shed a tear or two, but nobody will contend that *this* pistol was nipped in the bud—not after 43 years in service, the last 33 without a serious rival.

That's quite a record of service longevity, particularly in today's fast-moving world. How did we get this apparently indestructible—and irreplaceable—handgun in the first place? And how has it outlasted all rivals?

Even if you stretch the history of autopistols to include the early Paulson gas-operated revolvers, the class is scarcely 70 years old. As a matter of fact, the first true autoloading handgun was brought out by *Gebrüder Schonberger* in 1892. This is known to have been designed by Laumann: he was also the designer of a very similar handgun which was operated by a swinging ring-lever which also served as a trigger guard, and there is reason to believe that probably he found that his hand-operated original had a slight but embarrassing tendency to blow open by itself—a few minor changes and lo and behold—he had the first autoloader!

Perhaps, because people couldn't quite figure out why the Laumann/Schonberger worked, it was no commercial success. But in 1893 Hugo Borchardt's pistol appeared and the race was on. Borchardt, by the way, was a curious character. He worked for many of the major US arms companies (including the Sharps people: the "Sharps-Borchardt" was for years a most sought-after target action) but took his autopistol design to Germany for manufacture by Ludwig Loewe and Company, probably hav-

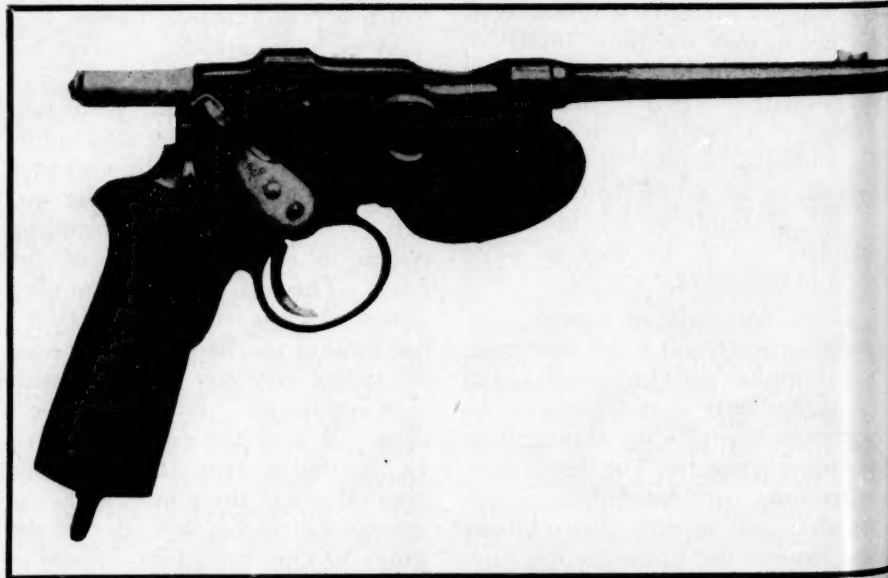
ing been persuaded to do so by Georg Luger.

Appropriately, in 1897, the Borchardt was apparently the first autopistol tested for possible adoption by the US, but it was not adopted. Since the action extended about as far back along the shooter's forearm as the barrel did ahead of the shooter's trigger finger, the pistol could scarcely have been very appealing to men accustomed to handling the revolver.

Also in 1897 1st Lt Fredk. S. Foltz,

Illustrations from SMALL ARMS OF THE WORLD by W. H. B. Smith

Laumann — first true autopistol



1st US Cavalry, published in the *Journal of the Military Service Institution of the United States* a most laudatory article on the new Mauser self-loading pistol. Foltz was the Mauser's best friend in this country, but his luck was uniformly bad. The Mauser, forwarded by the Chief of Ordnance in 1898 for tests by a board of officers at Springfield Armory, ran into the Spanish-American war and an unfavorable reception by the board, which took a dim view of it as a replacement for the carbine (even with its detachable shoulder-stock).

Another man with a built-in jinx was Fendall S. Pegram, who in 1898 offered 2 (6.5mm and 7.6mm) blow-forward Mannlicher 1894 pistols. They were repeatedly passed over for tests until the big trials of 1900. By that time Pegram was quite put out about the whole thing. When the tests were announced, he, like Achilles, decided to stay home—and was thereby spared the embarrassment of seeing his entry malfunction repeatedly and finally blow up on the 281st shot.

The Mauser came up again—and went down again. The board felt that it worked well, was of excellent construction, was easily loaded and fired, had high initial velocity and was more accurate than the revolver—but it was large and cumbersome, complicated, expensive, more diffi-

cult to care for than a revolver and was of foreign origin, too. The earlier board's opinion of its undesirability as a carbine replacement was renewed and the caliber (7.3mm or .30) was considered too small.

The third entry was a Browning-Colt in .38 auto (the cartridge which later became the Super .38) which passed its tests very well. The board suggested that a supply of these be purchased for field tests, "preferably in a larger caliber." This was a request easier to make than to comply with.

Those were the days when widely divergent views on the desirability of various attributes of handguns were held by people in this country. Some remained satisfied with the then-service .38 revolvers—others, with memories of juramentado Moros who were dead but wouldn't lie down and make it official, plumped for nothing smaller than the .45. (Indeed, the Philippine Insurrection resulted in the resurrection of many Army single-action .45s and later—1902—in the purchase of Colt's "Alaska" or "Philippines" Model double-action .45s.) But, on the other hand, European thought favored the small-caliber high-velocity autoloader. Even Britain, where the large-caliber revolver and big-bore "howdah" pistol (such as the Lancaster or the Belgian Braendlin) had long been in favor for "uncivilized" war-

fare, had been rudely jolted by the Mauser 7.63mm in Boer hands. And Winston Churchill credited the Mauser with saving his life by its speed of fire and ease of handling when he fell into an ambush in the Sudan campaign.

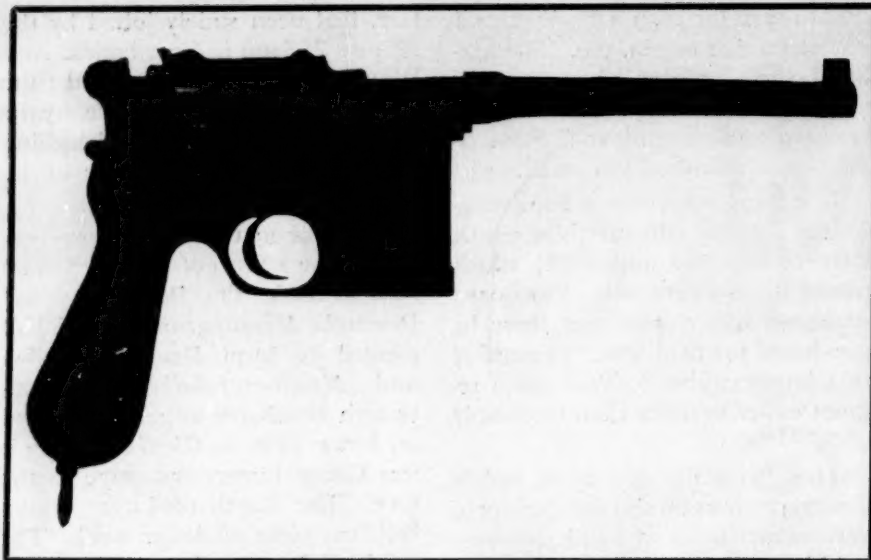
To make matters even more confusing, the 2 firms of Ludwig Loewe (which made the Borchardt) and *Desutsche Metallpatronenfabrik* had merged to form *Deutsche Waffen und Munitionsfabriken* and, although Borchardt apparently stayed on for a time as *Oberingenieur*, it was Georg Luger who came to the fore. The Borchardt-Luger was a brilliant piece of design work. The original long and unwieldy Borchardt action was squeezed down to make the superb Luger, long a favorite of shooters the world over. So early were its virtues recognized that the M1900 in 7.65mm was scarcely on the market before it was adopted by the Swiss government.

And so, Aguinaldo to the contrary notwithstanding, there was much support for the small-bore autoloader.

Early in 1901 another board was convened to examine this Luger in 7.65mm. Its findings were apparently favorable, and it recommended the purchase of 1,000 Lugers from DWM, allocating \$15,000 for the purchase. Those, indeed, were the days! When the pistols came in they

Borchardt — first to be tested by the US





Mauser — tested 3 times, finally rejected

were distributed for field test, "5 to each troop of cavalry in service, and the remainder to the light artillery and officers at West Point." An improved model of the Brown-ing-Colt was also tested and early in 1902 the board allotted \$2,000 for the purchase of 200 of these pistols for field tests.

The Mauser came up again — and went down for the third time. Another board of officers met, examined it and witnessed tests — but even the presence of Paul Mauser II, the inventor's nephew and a very creditable performance by the pistol couldn't break the spell. The board's recommendation that a supply of the pistols be purchased for field test, although approved by the Chief of Ordnance, was disapproved by the Board of Ordnance and Fortification. This, apparently, was the blow that killed father. Mauser pistols did not reappear in US tests.

The Luger didn't pan out too well in field tests and the 1,000 were finally sold through commercial channels. Field tests of the Brown-ing-Colts were more promising. Initial tests were given various other handguns, such as the Webley-Fosbery "automatic revolver" and another Mannlicher, but official opinion was gradually shaping up to favor a large-caliber autoloader, although the revolver still had literally an army of advocates.

To settle the question it was decided to hold a definitive competitive test. A special rimmed revolver cartridge and a special rimless auto-



Webley-Fosbery — an automatic revolver

pistol cartridge with practically identical ballistics were developed in 1906. Late in that year, War Department special orders were issued directing the convention of a board of officers to set up a testing program, to test revolvers and pistols referred to it by the Chief of Ordnance and to report which, if any, of the weapons tested showed enough merit to replace the .38 revolver.

The Board met in January 1907, broke up — perhaps with an eye on the weather — and reconvened early in March. Ready for test were the Colt, Smith & Wesson double-action

revolvers, the Webley-Fosbery automatic revolver (chambered for the rimmed .45), the Colt, Luger and Savage (single-action) and the double-action Knobles and White-Merrill automatic pistols, chambered for the rimless .45. A Bergmann pistol was also entered, chambered either for the rimless .45 or for the 11mm Bergmann. The Luger used a special load giving about 760 f/s in the rimless .45, but it also worked satisfactorily with the regular M1906 load and with special test loads varying 25 per cent each way from normal.

The use of the 2 special 1906 cartridges permitted comparison not only within the groups of revolvers and of autoloaders but also between

the 2 groups. As it turned out, this was a bad break for the revolvers!

The Webley-Fosbery was disapproved as a service weapon. The board felt that both the Colt and Smith & Wesson passed the tests satisfactorily and it approved them as service weapons (the Colt being preferred) — but it noted "extreme shock of recoil with large calibers, impairing accuracy and tending to produce flinching." The board also took note of the "practical impossibility of reloading in combat, when mounted, in cold weather or when wearing gloves" and of the "diffi-

culty of partial reloading." Accuracy was inferior, ballistic efficiency was poor.

Obviously the revolver came off rather a poor second in one of the few tests in which it could be directly compared with autoloading pistols firing the same loads.

Among the autoloaders, the first casualty was the Bergmann. The board disliked it on general principles anyway — the magazine was located in front of the trigger guard; grip, hang and balance were poor — so when it balked on its first shot it went out, right then.

The Knobles, both single-action and double-action models, were examined by the board: they too refused to fire and were put down as being so crudely manufactured that any test of them would be worthless. The ingenious White-Merrill sputtered, clonked and banged along for 211 rounds, after which the board gave up on it, too.

The Browning-designed Colt had at least one major advantage in that its manufacturers had had some experience with large-caliber autoloaders. In 1905 the firm had actually placed a successful .45 autopistol on the market and it might be noted that it was Colt's commercial .45 cartridge (with a 230-grain bullet instead of the original 200-grain) which was ultimately adopted as the service cartridge.

The Savage, designed by Elbert H. Searle, was a bulky-looking but not particularly heavy arm and the Luger was little more than a scaled-up version of the 7.65mm models.

Of the 3, the Colt came off best —



Luger .45 — the Borchardt action was squeezed down

it used the right cartridge, was easy to handle and performed well. The Savage, good in most respects, was rather violent in action. The Luger had a double disadvantage of being foreign-made and of being designed for a special load.

The board approved the .45 double-action revolvers for service but gave them very little praise indeed. Conversely, though it did not approve any of the autoloading pistols for immediate adoption, it was much impressed by their good points, including "reduced shock of recoil, increasing accuracy, facility of recharging, especially in cold weather or when mounted" and the "greater number of rounds in magazine than is carried in any revolver cylinder." In fact, the board said "The advantages of the automatic pistol and the disadvantages of the double-action revolver . . . are deemed by the board of such importance that it desires to state its conviction that the principle of the automatic hand fire-

arm should be adopted for the military service, and that the adoption of a specific arm should be contingent only upon the question of whether it is mechanically satisfactory in service."

That, then, was the turning point. Previously, the revolver was in the driver's seat — but with that report it turned into a hot seat. Adoption of an autopistol was only a matter of time.

The board proposed that enough Colt and Savage pistols be purchased to arm 3 troops of cavalry with each, and the then Chief of Ordnance, Brig Gen William Crozier, approved the proposal and authorized the purchase of 200 of each type. The board also suggested the purchase of a number of Colt double-action revolvers for inclusion in the field tests, but this was turned down as having already been taken care of by the board's test work.

Colt, with a commercial version of the arm in production, promised delivery in 10 months, but Savage, unhappy over the thought of having to tool up for an order of only 200 items, at first would not accept an order. Steps were taken to purchase 200 Lugers in place of the Savages, even though the Luger was considered the least satisfactory of the 3 arms which had completed the test: at the last moment Savage reconsidered and accepted the order and Luger was out.

Probably the only decision made by the board with which there could be any real argument was that resulting in the adoption of requirement No. 7: "Adapted for use as a short-range weapon, not as a carbine." In thus limiting the range

Savage — violent in action





Colt Lightweight Commander

requirements of the arm — and in knocking out pistols with attachable shoulder stocks — it eventually opened the door to the late, but loudly lamented, M1 carbine.

In any case, in 1908 Colt came through with 200 pistols which were promptly issued for field testing, and shortly thereafter the Savages were delivered and issued. Preliminary reports from the field resulted in the withdrawal of the pistols and in their return to the manufacturers for modification in 1909. During 1910-1911 several informal preliminary tests of both the Colt and Savage automatic pistols, caliber .45, were made, and also 2 formal competitive tests of the 2 pistols were held at the Springfield Armory by a board of officers appointed for the purpose. The final test of the two pistols was held on 15 March 1911. On account of its superior showing during the final test, the Colt pistol was recommended by the board for adoption for use in the military service. This recommendation was concurred in by the Chief of Ordnance, and the adoption of the Colt automatic pistol, caliber .45, M1911, in place of the Colt revolver, caliber .38, as the service arm, was approved by the Secretary of War.

The 1911 Colt was a ringer: it differed materially from the modified 1905 and 1908 pistols with which

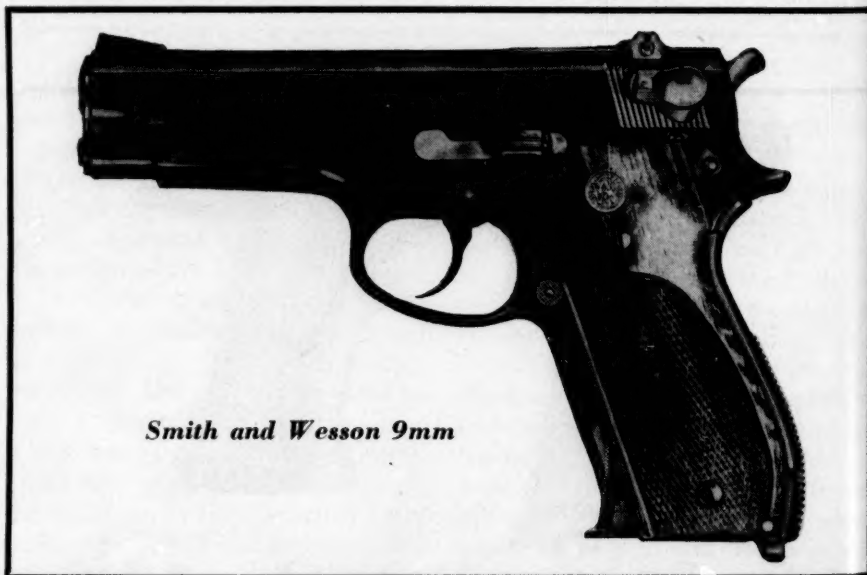
Colt had gone through the first tests and field trials. A new locking system made it a most difficult gun for the relatively unpracticed shooter to "snapshoot;" otherwise it performed very creditably.

The Savage faded out of the military picture, but as a pocket piece in calibers 7.65mm and 9mm it gained great popularity before, during and after WWI, which must have been some comfort. Luger, with his pistol in 7.65mm and 9mm being adopted by nation after nation (notably in 9mm by Germany as the '08), probably lost little sleep over his early elimination.

Seldom if ever was a gun adopted at a more opportune moment. In the few years remaining before our entry into WWI there was time for Colt (and, to a very limited extent, Springfield) to produce some 75,000 M1911s — too many to be set aside, too few to let anyone claim that there were enough on hand. "Only a few men of each infantry regiment carried pistols when our troops first went into the trenches. But in almost the first skirmish the weapon proved its superior usefulness in trench fighting. Such incidents as that of the single American soldier who dispersed or killed a whole squad of German bayoneteers which had surrounded him struck the enemy with fear of Yankee prowess with the pistol."

When it became obvious that the .45 pistol and the hand grenade were a combination of rare and great merit in trench warfare, production of the M1911 was stepped up tremendously. After an early hassle to get good production blueprints which would assure interchangeability of parts without fiddling and filing, Remington-UMC was brought in as another production source. Later, manufacturers of everything from cash registers to monotype equipment were handed contracts. The Armistice came along before anyone except Remington (13,152) and Colt (425,500) got into production.

During WWI the Jolidon .45 auto — which, externally, closely resembled the M1911 but which was quite different internally — was tried out



Smith and Wesson 9mm

and was, unofficially, regarded as extremely meritorious. Grant Hammond, one of the most persistent and unfortunate firearms inventors of all time, offered a remarkably accurate, but large and complicated .45 auto to the Navy in 1917 and to the Army in 1919. Wartime was no time to be changing pistols, and the end of WWI found this country with about half a million M1911s on hand, so any candidate to replace it as our service pistol had an uphill fight. Even the greatest excellence of design and construction, plus the sponsorship of the Navy, were not enough in the case of the Remington .45. Tested and reportedly adopted for Navy service in 1918, it was set aside because the powers feared that having 2 types of pistols in service might cause confusion. (Just how this was reconciled with the purchase of 151,700 Colt and 153,311 Smith & Wesson .45 double-action revolvers in 1917-1918 isn't clear.) Individuals who have studied the Remington-Pedersen system and have compared it with the Browning-Colt-M1911 system feel that in this case the better gun lost.

In 1921, the M1911 was modified to become the M1911A1 with a new front sight, mainspring housing, hammer and grip safety spurs and trigger and with clearance cuts in the frame for your trigger finger — and that's the way things stand today.

Over the past 40 years the M1911 has been a lot of places — almost all over the world in US service. It was adopted with minor variations by the Norwegians, bought by the British in .445, purchased for shipment to Russia, marked in Cyrillic "Angl.



Browning (high power) 9mm

Zakaz" (for "English Order") — and, according to one report, replaced in their crates by rocks, the guns being sold by Russian inspectors over-impressed with the free enterprise system. At one time it was foredoomed to limbo by the adoption of the carbine — and now the carbine is where?

But now "Old Faithful" is itself under the gun. Challengers arise on all sides: John Browning's last design, produced as the *Fabrique Nationale d'Armes de Guerre's* "Grande Puissance" (High Power) M35, with its magazine capacity of 13 rounds of hot-loaded 9mm Parabellum, has found favor in the United Kingdom and in Canada. Colt's lightweight Commander in .45, Super .38 or 9mm Luger is waiting at the door, and Smith & Wesson has brought out a new military and police autoloader in 9mm Parabellum. But these are all developments of the basic Browning system of which the M1911 was one of the earlier ver-

sions. So even if one of them makes the grade, the ghost of the 1911 will still go on. But there are others—the P-38 (in its original *Heeres Pistole* form) was to have been offered in .45 ACP and Super .38 in addition to its standard 9mm Parabellum. And what is to prevent the Manurhin organization, already producing Walther PP and PPK pistols, from cobbling up some improved versions of the P-38? Mexico, too, may have an entry: the excellent pistol designed by Alejandro Obregon and first produced in 1934 and 1935 was brought up to date as the Model 1951, and it certainly deserves a chance to compete. And there are a few dark horses just waiting for the race to start: I guarantee there's at least one, anyway!

So the search begins again and many of the old problems again demand solutions. What caliber will we consider? Is the .45 to continue without competition, or will we take note of the improvements in such cartridges as the 9mm Parabellum — now very heavily loaded — and the 7.63mm Mauser/7.62mm Russian? Or will we perhaps look for an entirely different round? Will requirement No. 7—"Adapted for use as a short-range weapon, not as a carbine"—rise again, or will we take note of the virtues of the pistol-carbine (with attachable shoulder stock), a weapon which combines the handiness of the pistol for short-range work with the medium-range accuracy of a carbine, once the stock is hitched on?

We know what *has* happened. Now let's see what *will* happen! US & MC



Obregon 1951

ORGANIZATION FOR COMBAT ENDURANCE

By Capt. P. C. Roe

THE RIFLE COMPANY IS THE heart of our combat organization, even in this atomic age. It is the pace-setter in the attack; when the companies move, the attack moves. It is the pivot of the defense; when the companies hold, the defense holds. But the companies quickly wear thin in battle. They grow weak from losses and weak from fatigue. They don't last long in continuous action. Can we organize our rifle companies so they can continue their tasks for a longer time? Can we give them some form of built-in combat endurance?

General Pershing faced similar problems in the early part of 1917 when he left for France to prepare for the arrival of the AEF. He was concerned not only with the rifle companies, but with the battalions, regiments and divisions. World War I was the first great war of attrition. The organization problems of that war were materially different from those of the past. The big problem was to design units that would last as long as possible without relief in the grinding attrition of trench warfare.

Soon after his arrival in France, Gen Pershing set up the AEF Organization Board to study these problems. At the same time the problems were being studied by the War Department.

The original war plans of 1916 called for a division having 3 infantry brigades, each with 3 regiments of three battalions each. The bat-

talions, under this plan, were to have 4 companies of 150 men each. Immediately after the American declaration of war, the Army War College was directed to study this organization and see whether or not it met the needs of the conditions in Europe. The War College recommended an increase in the size of the rifle company to 200 men, to be increased later to 250 men as favored by the British. The 1st and 2d Divisions, AEF, were so organized — but with 2 instead of 3 infantry brigades.

The solution recommended by the AEF, and eventually adopted by the War Department, was big companies, big battalions and big divisions. The infantry division had 28,059 men. The battalions had 4 rifle companies of 256 men each. In the 2 infantry brigades there were a total of 16,938 men. Supporting the division were 48 light and 24 medium artillery pieces.

The two major reasons for a division of such size are interesting. The first was the influence of trench warfare. Because of the problems and loss of time involved in relieving a division in this kind of war, it was decided to organize a division big enough to stay in the line for long periods of time — "until a decision could be reached" as Harbord said.

By increasing the size of the rifle company from a planned strength of 150 to an actual strength of 256 it was felt that the company could take heavy losses — up to 50 per cent or more — and still have enough men left to operate effectively. The shortage of artillery also had an influence. Artillery was the most critical item of equipment in the AEF. Because of the scarcity of cannon, the artillery units often had to remain in the lines long after the infantry had been exhausted and relieved. Pershing didn't like the idea of splitting up his division teams like that, so the AEF board proposed to give the division enough infantry to remain in the lines as long as the artillery could shoot. Trench warfare demanded that a division remain in the lines for extended periods. Now the artillery situation forced the division to remain in the lines indefinitely. It is neither the first nor the last time that a purely local and temporary shortage of material has had such a lasting influence on organizational and tactical thought.

There were some surprises in this division organization. During the St. Mihiel and the Meuse-Argonne offensive the AEF suffered an average casualty rate of about 270 men per division per day of combat. The big companies were quickly whittled down. But instead of a steady decline in strength, the company strength dropped sharply in the first

We can increase combat efficiency



few days of battle and then declined more slowly thereafter. Once cut down to proper size through combat attrition the companies could then continue in battle with only a small reduction in combat efficiency and with much smaller loss rates.

This should hardly have been a surprise. A similar phenomenon had occurred in the Civil War as Gen Schofield had noted. The attrition of the large and unwieldy Union regiment, due to combat losses and the evil replacement system, cut the regiments down to handy and useful battalions of about 300 to 400 men that could perform well on the battlefield without undue loss. Late in October 1918, Gen Pershing, faced with the need for some 100,000 replacements, and having only 66,000 on hand, recognized the desirability of smaller companies and cut their authorized strength to 174 men, making a total cut of some 4,000 in the strength of the division.

There are probably several reasons for this sudden decline in strength followed by a much slower decline. One is a process of "natural selection" — the quick and the dead. For a trained and well adapted man whose mind is on his work, the chances of becoming a casualty are much less than for the less well prepared man. In the early phases of battle the less adept quickly drop out. Those left may bear a proportionately greater load but they have prospects of lasting much longer. Then too, the smaller unit is much more easily controlled — it reacts quicker. There are just that many less men who misplace packs or fall asleep at rest halts to delay movement. Word passes more quickly. The squad and platoon leaders have fewer men to worry about and can pay more attention to them. Lastly, in the big companies there are often too many men for the job at hand. They can't be concealed as easily.

They are more vulnerable.

There is little doubt that a large portion of the combat losses could be attributed to packing too many men into the firing line for the task at hand. The Germans, at the start of the war, were making assaults in a dense skirmish line with one man per yard of front. However, they soon learned better. By the end of the war they had decreased that density to less than one fifth and had done away with the skirmish line altogether, assaulting in an irregular line of squad groups. They recognized that the power of the attack lay in the artillery support and in the fire of infantry weapons with a minimum use of shock action and a maximum use of maneuver. Similarly, the French and British finally began to abandon the use of dense skirmish lines. The American infantry, trained in the old tactics and entering the war late, persisted in the use of unnecessarily dense skirmish lines with minimum assistance from supporting weapons.

The problem was simple. At the start of WWI there were few machine guns and fewer auxiliary infantry weapons. To build up a sufficient fire superiority, with rifles alone, for a successful attack required many men in the firing line — an extremely vulnerable formation. By 1918 the machine guns and mortars had taken over much of this task of gaining fire superiority and fewer men were required. The Germans had, by 1918, considerably reduced the size of their rifle company. They had found, as Gen Blumentritt states "that a company of 250 men was too large for practical employment. Such apportionment led to mass commitments and resultant high loss." The Germans took the lesson to heart and built their WWII infantry organization around a refinement of the 1918 model.

Probably because of the limited American combat experience and an unwillingness to accept lessons learned by the Allies, the Army retained the 256 man company and the 2 brigade division for its future organization. However, the 1920 board that studied the question did recommend that the *extra* men in the company be gathered up and sent to some secure place in the division rear where they would be held and used to replace battle casualties. A year later, however, a War Department board again studying the problem of organization thought that there should be a reduction in the size of the company to around 200 men. It stated that the company could be reduced to 3 platoons with "a gain in effectiveness."

Between the wars there was much thought, discussion and experimentation with infantry organization. In the Army, the rifle company remained much the same. By 1939 the infantry had adopted the more modern tactics developed by the Germans and proceeded to reorganize accordingly — adopting the triangular division and making major changes in other aspects of organization.

The size of the rifle company was cut, at this time, to 175 men — recognition of the fact that crowding too many men into the firing line did not necessarily increase offensive combat power but certainly did increase vulnerability. The determining factor in the size of the rifle company, as explained by the then Chief of Infantry, Gen Lynch, was the size of the rifle squad. The squad was considered as the "unit of morale" and its size was increased from 8 to 12 men to give it a longer combat life as a unit. It was considered that the squad could remain effective as a separate unit until it was reduced to less than 6 men by losses. That means that 6 men per squad

and cut down the casualty rate by reducing the size of our fighting units



was considered adequate for entry into combat, but that the other 6 men were needed to sustain action. Thus they could be considered as "fillers" or "built-in replacements."

The Marine Corps started WWII with a 187 man rifle company having 8-man squads. During the war the size of both the rifle company and the squads increased, recognition of the heavy attrition in the initial phases of the amphibious assault. The Army's rifle company was increased from 173 men in 1938 to a maximum of 223 in 1941, but declined again in 1942.

After WWII the Army reduced the size of the squad to 9 men. War-time experience had shown that 9 men was about all a squad leader could handle, even with an assistant. At the same time a weapons squad was added to the Army rifle platoon, giving the platoon leader the means of forming a strong base of fire with a relatively few men. The present size of the Army rifle company is 191 men, with only 71 riflemen as compared to 108 (including automatic riflemen) during WWII. Our present Marine rifle company has 226

tions that infantry units were too big.

Major Scotter, a British officer, reported that the squads in his company were often reduced to 5 men with no noticeable decrease in their combat power but with a considerable increase in celerity of movement. Liddell Hart goes even further. He states that squads reduced to 5 or 6 men by attrition are able to remain in combat thereafter for considerable periods of time without further substantial loss. He attributes this to the fact that the smaller squad is much more handy and can make much better use, as a group, of cover and concealment. He recommends 5 as the prescribed size of the rifle squad.

Colonel Branner P. Purdue, commander of the 120th Inf Regt during the Battle for Germany, made a study of the losses in his regiment. He concluded that, in accordance with our prescribed doctrine, there were too many men in the assault in proportion to the amount of supporting fire. As a consequence he made a 25 to 50 per cent reduction in the number of men used in the

ganize an objective. The British, in the Western Desert, found they had more men in the infantry divisions than could be adequately supported by the artillery and AT guns. Just before the stand at El Alamein this information was published by the Eighth Army and the fourth company of each battalion and one brigade from each division was sent to the rear to be used later for replacements.

The problem was much the same in the close-in fighting needed for the reduction of fortified positions. The historian of the 84th US Inf Div has this to say about breaking the Siegfried Line:

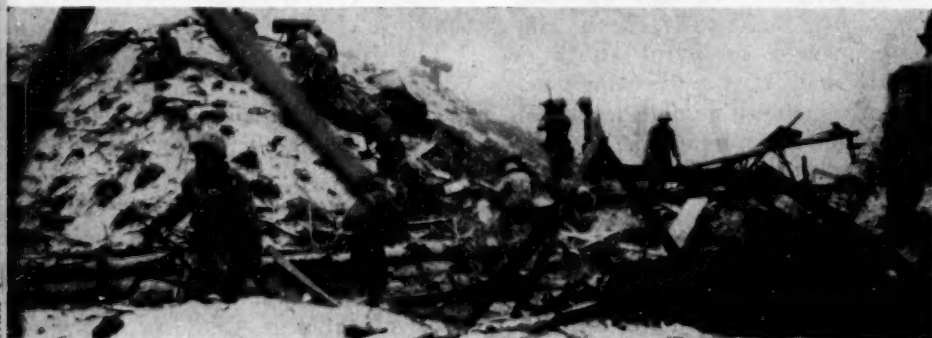
"Experience had shown that a pill-box could be taken and losses held down to a minimum by using a limited number of men who knew their jobs and understood how to use the combined resources of infantry, engineers, armor and artillery. To use more men simply gave the enemy more targets without increasing effectiveness."

Marine experience was along similar lines. After Tarawa the 2nd Mar Div made a study of the causes of their heavy losses. One reason, according to an officer who was with the division at the time, was the use of too many men for the assault of pillboxes. A substantial number of the men making up the assault teams were not needed for the job and were therefore exposed unnecessarily — becoming casualties without making an effective contribution to the battle.

These wartime experiences have been reflected in a few, often overlooked, sentences in our tactical doctrine. FM 7-40, *Infantry Regiment*, states that the regimental commander —

"... determines the minimum force needed for a high probability of success in capturing each of these objectives. The regimental commander avoids the habitual use of a battalion when a smaller unit can be successful. To use a battalion when a rifle company can capture the objective needlessly exposes soldiers to enemy fire."

In S. L. A. Marshall's studies of combat we can find other evidence that too many men are used in the firing line. He states, in *Men Against Fire*, that out of several hundred



men — 117 being riflemen — about the same rifle strength that we had during the war.

During WWII, as during WWI, combat attrition of infantry units was a major problem. The Army found that during periods of intensive combat an infantry division suffered 100 per cent loss in its infantry regiments every 3 months. In all theaters the need for replacements to fill out depleted rifle companies became acute. By 1944 the British were forced to break up divisions at the rate of one every two months to provide replacements for the others. Yet, as in the First World War, there were also indica-

attack by assigning units much wider frontages than those "normally prescribed." He further stopped the flow of replacements to his rifle companies, except when in reserve. The size of his rifle companies dwindled — but their objective taking power did not. His conclusion was that as few men as possible should be assigned to the attack and that the power of supporting arms should be exploited to the maximum. Increasing the density of men in the attack makes them more vulnerable to mortar and artillery fire — the cause of the vast majority of our combat casualties — and provides more men than are needed to mop up and or-



rifle companies interviewed only 15 to 25 per cent of the men actually fired in combat. He doesn't state that only some 110 riflemen, machine gunners and so on (only 57 per cent of the company) are even *supposed* to fire. The rifle company of WWII, in contrast to the companies of WWI, was no simple aggregation of shooters. It is a complex tactical unit. The other 80-odd officers and men have the primary task of controlling and supporting the shooters in one way or another. This means that some one third to one half of those who are supposed to shoot were actually doing so. Of the rest, some were genuine non-firers, due to faulty training or various psychological blocks, but many more simply did not have the need or the opportunity in the course of a company action. With the "normal" 2-up-and-1-back formation, some one-third of the shooters in a company may never get into action. The conclusion from this is that these non-shooters, together with some of the supporting personnel, are not needed in the rifle company for effective combat action.

We use too many men and provide too wide a margin for error. The historical trend in combat for the past hundred years has been toward a greater emphasis and reliance on firepower. The Army infantry division of WWII had more than twice the firepower of the WWI division with less than half the men — and much less than half the riflemen. In addition, it could maneuver that fire far more quickly and effectively. Shock-power, for infantry action is almost, but not quite, an anachronism. In Korea, as in WWII, the number of close-in, hand-to-hand assaults, as compared to the number of objectives success-

fully taken, has been relatively small. Battles, like wars, are seldom carried to their ultimate extreme of violence. The modern, well supported infantry unit can deliver sufficiently accurate fire on an objective to cause the enemy enough casualties so that he will not often stick around for the actual assault. Above a certain minimum number, additional men in the rifle company do not add to the combat strength of the company — they become a liability. They do, however, provide a margin for error (the reserve) and they provide built-in replacements. Just what is this minimum effective size of the rifle company? How can we figure it?

We could go back to Liddell Hart's figure of 5 as the minimum effective strength of a rifle squad, or to the pre-war Army figure of 6. A slightly more conservative number would be 7 men. This is just enough men for the job — but not enough to stand many losses. This will give us 63 riflemen as a bare minimum for the company. If we further cut personnel in the company, reducing the number of ammunition carriers

in the machine guns and mortars, messengers and a few others, we would find that a rifle company of 126 men is the smallest possible size to sustain combat with a fair degree of effectiveness. (See Figure 1.)

Such a rifle company would have the bulk of its firepower intact — enough personnel to man nearly all weapons with reasonable effectiveness. The squads would be reduced, but still effective as units. The mobility of the company might be slightly reduced since crews for mortars and machine guns are cut, but it probably would be improved, on the other hand, by the reduction in the total number of men. We could estimate the combat efficiency of this company at about 80 per cent of a full strength rifle company, but at the same time it has only 56 per cent of the personnel of a full strength company. In Korea we operated steadily with rifle companies of between 140 and 160 men with only slight decreases in combat efficiency. What we did lose in these companies was not so much initial combat power, but a loss in the ability to sustain heavy combat for any extended period of time. Even a relatively small number of casualties would cause a sharp drop in combat efficiency. If we drew a theoretical curve of combat efficiency versus strength, based on these assumptions, we would have something like Fig. 2, p. 34. This shows, as have our other data, that the rifle company strength can be cut as much as 40 per cent before there is a significant drop in combat efficiency.

The extra men have served a purpose, in the past, by helping to keep

UNIT	T/O STRENGTH	REDUCE BY:	REDUCED STRENGTH
RIFLE PLATOONS (3)	132	6 MEN PER SQUAD 2 MESSENGERS PER PLATOON	72
MACHINE GUN PLATOON	54	4 MEN PER SQUAD 1 MESSENGER AND 1 AMMO CORPORAL	28
60MM MORTAR SECTION	19	3 MEN PER SQUAD	10
ROCKET SECTION	15	4 AMMO CARRIERS	11
HEADQUARTERS SECTION	8	NONE	8
TOTAL COMPANY	226	44.3% REDUCTION	126

FIG. 1. REDUCTION IN RIFLE COMPANY

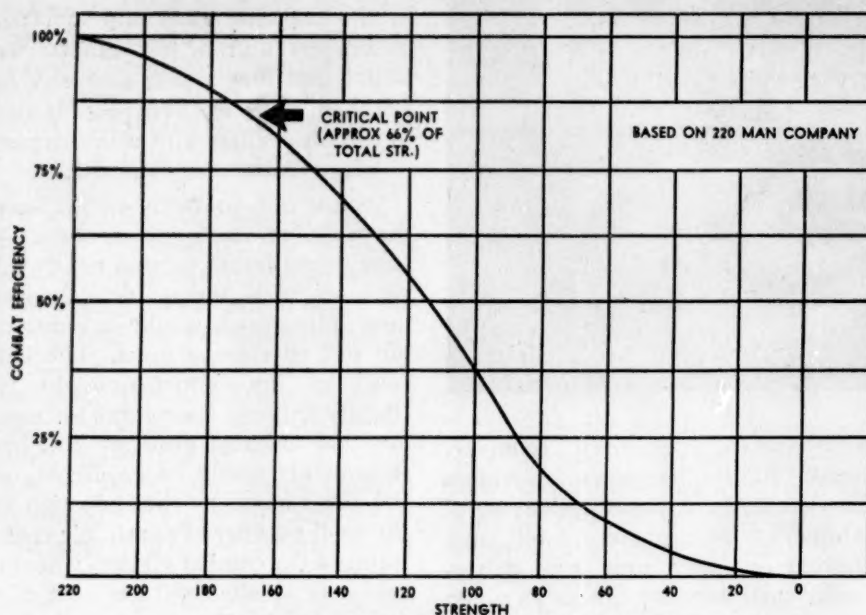


FIG. 2 COMBAT EFFICIENCY VERSUS STRENGTH (THEORETICAL)

the company above the minimum effective strength for a longer time — extending the combat life of the company. This concept of having organic replacement — more men than initially needed — came in with WWI and we can consider it as a remnant of the outdated military thought of that time. We have retained this idea, to a certain extent, in the Marine Corps because of our amphibious experience. Casualties run high in the initial stages of the amphibious assault and it has been necessary to beef up the rifle companies so that they can lose men and still have enough left to continue combat effectively. It isn't practical, and in some cases possible, to pro-

vide early relief or replacements for these companies in an amphibious operation. Figure 3 shows the daily strength for the average of all the rifle companies on Saipan. The high casualty rate in the first day shows the effect of putting some 8,000 men from the 2 assault divisions onto the beaches within 20 minutes after H-Hour and having, by nightfall, the bulk of 2 divisions ashore on a narrow strip of beach 10,000 yards long and barely 1,500 yards deep. Not until the O-1 line had been passed did the casualty rate decline to more "normal" proportions.

The use of large companies was necessary to allow these units to remain effective for a longer period —

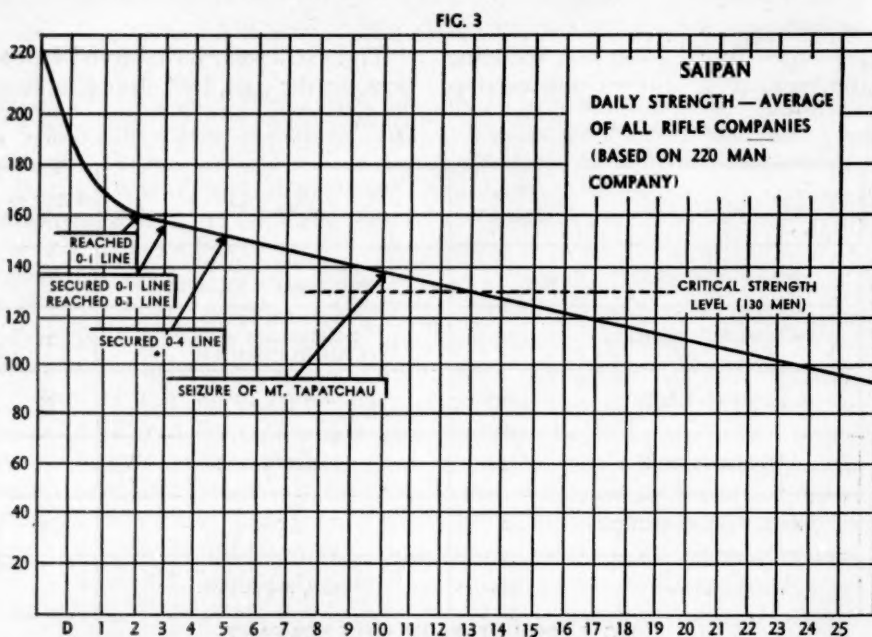


FIG. 3

11 days for the average company. But was this the most effective use of the additional manpower? As we have seen, our other information indicates that it was not the best use. A smaller company, with the same firepower, would have taken fewer casualties and would then have lasted almost as long.

A rough check of this idea can be obtained by comparing our own units with those of foreign armies. The British have a battalion of about 683 men (for 3 rifle companies only) and the Russians have a battalion of 555 men. The Russians, with a great plentitude of manpower, are getting more firepower per man in their battalion than we are. However, the Russian battalion was not designed for extended combat endurance. It was organized to give maximum power for a short period of time. Further, it was designed for operations nearer to home where supply lines are shorter and obtaining replacements is not quite such a problem. However, it still obtains a pretty fair endurance, in comparison with our battalion.

This study has concentrated on the casualty rate as a measure of the combat attrition of a rifle company. There are other, and almost as important, aspects — the physical condition of the surviving men after a period of sustained combat. Exhaustion may overtake a unit and reduce it to ineffectiveness long before enemy fire can do so. The Operations Research Office team that went to Korea in 1952 to study the effects of combat on men found some rather startling facts that might upset some of our traditional calculations. They found that a man going through a period of sustained, though not particularly heavy, combat will be in far worse physical condition than men going through a period of short but intense combat. They further found that it may take anywhere from 5 to 12 days before a man can physically recover from a period of extended combat. This is far different from the "good night's sleep and a hot meal" that we have usually considered sufficient. It has long been known also, that non-battle casualties, because of various psychosomatic causes, increase in proportion to the length of time a unit remains in combat. These aspects of combat

endurance show that it is not sound to plan on maintaining a unit in the line for an extended period of time.

To solve the problem of combat endurance then, we need to attack 2 problems; the casualty rate and physical exhaustion. We have seen that we can decrease the casualty rate, and thereby extend the combat life of a rifle company by decreasing the size of the company and giving it a higher ratio of firepower per man. By doing this we will get a much more favorable balance between firepower, assaulting power and maneuverability—a balance that will be commensurate with the conditions of modern combat.

The second aspect of the problem,

physical endurance, can be solved with the help of the additional personnel gained by decreasing the size of the company. They could be used to form a fourth company or fourth battalion. With this fourth unit, the assault elements would need to remain in line for a much shorter portion of the time, being relieved and rotated more often, allowing them more rest and keeping them in better physical condition. By using the same number of men in a battalion, but by dividing the battalion into 4 instead of 3 rifle companies and using the overhead personnel as a fourth unit instead of as "fillers," we can get far more out of them.

The idea of increasing efficiency

by decreasing size is not new to the military services, nor is it peculiar to them. One industrial concern recently increased production by 25 per cent by cutting their labor force. They found that some of their people were just getting in each other's way. It may seem sleight of hand to assume that we can increase combat efficiency by dividing the same number of men into 4 instead of 3 units. However, our information here indicates that it is so. It is a matter of having more shifts rather than having more men on the same shift. This forms a powerful argument for a quadrangular organization. It is worth our close and careful consideration.

USMC

COMPANY STRENGTH

"The question of the size of the squad, and consequently the fire team, is best discussed in connection with the consideration of over-all company organization.

"Among the majority of regimental, battalion and company officers with whom the question was discussed in Korea, the consensus was that the ideal strength for the infantry company in the field was about 180 men, and that this figure afforded the optimum balance when all factors such as the development of fire power, administrative help in support of fire and the need for over-all control were taken into account.

"A few placed the figure as low as 160 men and others said that it should be as high as 200. There were no estimates higher than that. The majority did not believe that the 200-strength company is administratively or maneuverably unwieldy, but their attitudes toward that figure was frequently expressed in these words: 'If we standardize at 200, our average strength level under the best field conditions will probably be about 180, which is about right.'

("According to the Korean data, this is an optimistic outlook. The average strength of the companies which were interviewed was about 125.)

"The consensus as to the fighting worth of the below-strength company can best be summed about as follows:

"100-125—'At this level the company is still in business and can carry out normal missions.'

"85-100—'Too light. The company begins to drag its feet and becomes dependent upon extraordinary help from the outside.'

"The data, however, do not altogether support these opinions of the commanders. In many of the actions taken under study the companies were under 125-strength at the beginning and took higher than average losses. Yet their response was well co-ordinated, sustained and aggressive. In several of the most noteworthy company fights, there were fewer than 80 fighters on the line. But there are also several graphic examples of the hard penalty which may be exacted from high commands when an understrength infantry company, being placed in line, becomes suddenly the focal point during a main surprise onfall by the enemy. Hard pressed to do the physical labor required for elementary protection in the local position, the company fore-

goes patrolling, extends itself over too much ground to remain unified should it become heavily pressed and neglects the essentials of completing a firm communications tie-in with upper levels. Thus the door is opened wide to a penetration which may cut to the rear without anyone's knowledge. The company in strength of 80 men or under can still fight. But except in situations where companies are aligned virtually shoulder to shoulder, it cannot prepare for a fighting job and still do the work required to give it unity with all other elements. This lesson is repeated many times over in the study of Korean small unit actions.

"But the fighting record provides no final answer to the larger question of what size the rifle company should be for optimum effectiveness. The combat company with strength of 125 appears to be equal to any normal fighting mission; by the same token, if another 50-75 men are added, the force is manageable and its fighting power is increased proportionately. The company commander in combat is not particularly concerned with the size of the unit so long as the assigned task seems to be within its capacity. If his communications are sufficient, he can exercise adequate control. He operates in terms of three rifle platoons, a weapons platoon, an administrative CP and various supporting arms loaned him by higher headquarters.

"In training, however, there is a definite requirement for the company commander to establish some personal contact with his men. The question is whether the present T/O company isn't just a little too large to enable proper cultivation of the moral resources of the unit. The company contains many diverse activities which tremendously increase the training difficulties of the company commander, such as 5 vehicles, mortars, machine guns and recoilless rifles. A possible approach to reducing the size of the company during the training cycle might be to kick some of these odds and ends up the chain of command where they could be pooled in specialized groups and loaned out to the company commander for his use. He would then have to impart a smaller number of specialized skills to the men under his control. The problem of combined arms (at the infantry level) could be met during maneuvers or exercises and in periods when the leaders themselves could study its varying aspects."

Commentary on Infantry Operations and Weapons Usage in Korea: Winter of 1950-51.

By S. L. A. Marshall. Operations Research Office, Johns Hopkins University. Report ORC-R-13 27Oct51.

Field Expedients

Cross the river high and dry. Your 782 gear can be a do-it-yourself kit

WHEN ONE COUNTRY RISES IN arms against another, the movement of men and arms is inevitable. In this movement, the commander often faces the problem of overcoming natural and man-made obstacles, such as streams and large bodies of water. Depending upon the terrain and tactical situation the order may well be: "Cross in the most expeditious manner."

Down on the platoon level such an order will initiate immediate preparation.

The fire teams receive the order and immediately start constructing their equipment floats as follows: One shelter half is laid out on the ground (the members of the team are carrying the field marching pack and this gives them all they need to make up the float with 2 men working together), another shelter half is laid on top, the tent poles, pins and guy lines are then rolled in the

By MSgt R. E. Porter

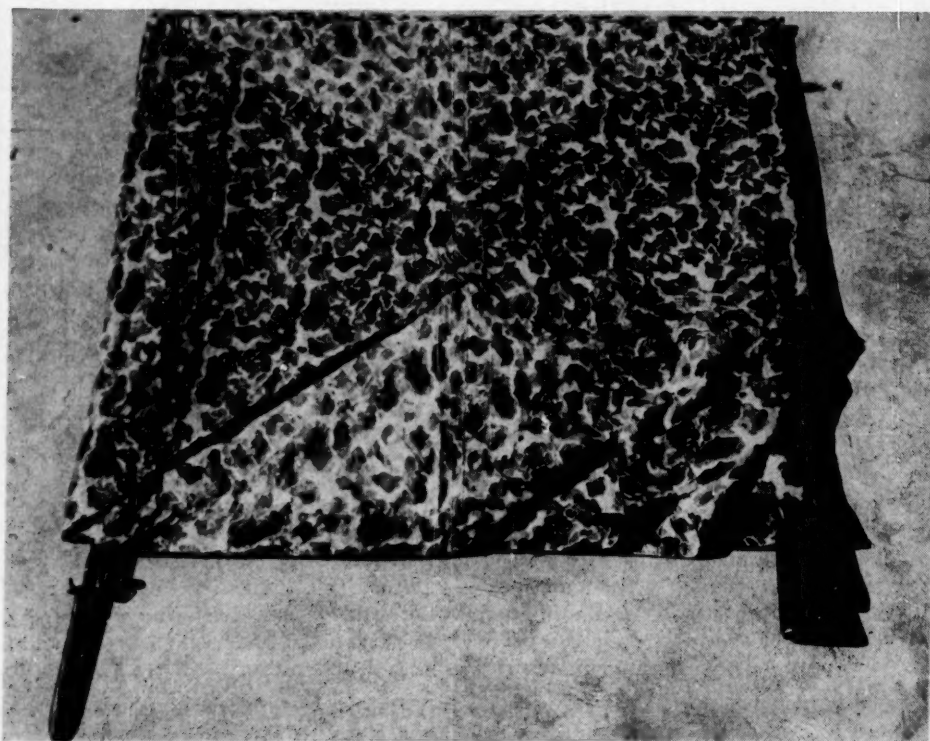
blanket forming a roll. The rolls are then placed on the opened shelter-halves.

One of the ponchos is removed from the top of the pack for later use. The 2 packs are then placed on the squared blanket, the cartridge belts are laid over them with the canteens lowered down next to the blanket rolls. The bottom and loop sides of the shelter-halves are folded up over the rolls and packs. The normal arms are placed on the tips of the pointed ends of the shelter-halves, butts and muzzles alternated. Both weapons are rolled up in these ends to within 8 inches of the blanket rolls and packs. The weapons in the rolled ends of the shelter-halves are drawn over the packs and

the poncho that has been held out is folded 3 times forming a long rectangle. The poncho is then placed over the rifles and the helmets on the wrapped butts and muzzles, round part up. The chin straps are fastened under the weapons holding the entire float securely. Pressure must be exerted on the rolled weapons that holds the float firmly together.

Any combination of individual weapons may be used in making this type of float (the BAR's added weight is not enough to capsize the float and the additional length is minor). If a machine gun is to be floated across water, it should be placed down at the base of the float because of its weight.

Another way to form the same type of float using no ties, instead of folding up the loop and button ends (after the rifles are pulled up on top of the pack and the helmets



Machinegun float — step 1



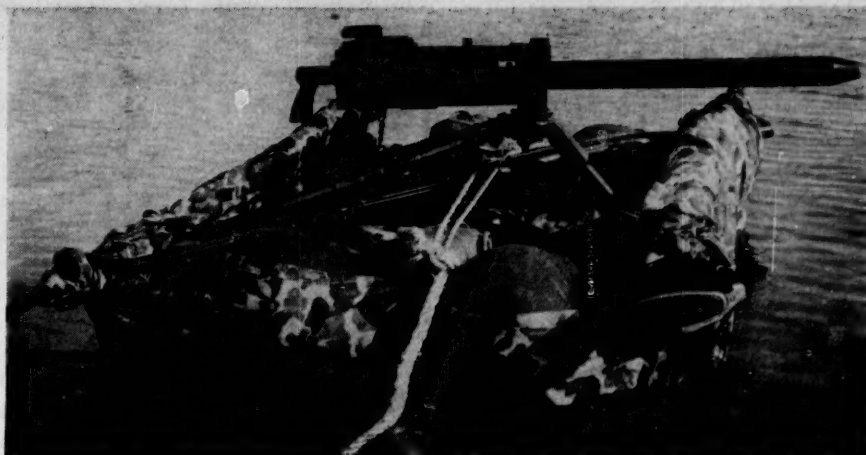
Step 2

are ready to be fastened) gather the edges up around the butts and muzzles of the weapons.

This float comes apart easily when the other side of the stream is reached, allowing quick return to action or deployment of troops. The gear is dry, with the exception of the side of the shelter-half on the bottom.

It was suggested that a float to carry a machine gun in the firing position be worked out. After a couple of nightmares and some long hours of deliberation, an adequate float was produced. A shelter-half was laid out on the ground with the pointed ends folded in, and 2 of the rifles with fixed bayonets were placed in the folds of the bottom shelter-half. The other shelter-halves were laid over the first one and the blanket rolls were formed into a four-leaf clover, making a square in the middle of the shelter-halves. The entrenching shovels, removed from the covers, were so placed that each spade folded up to form the corners. The handles were worked in between the folded ends of the blanket rolls and the knapsacks put on top of the clover-leaf forming an inside square. The belts, canteens etc were placed in this space.

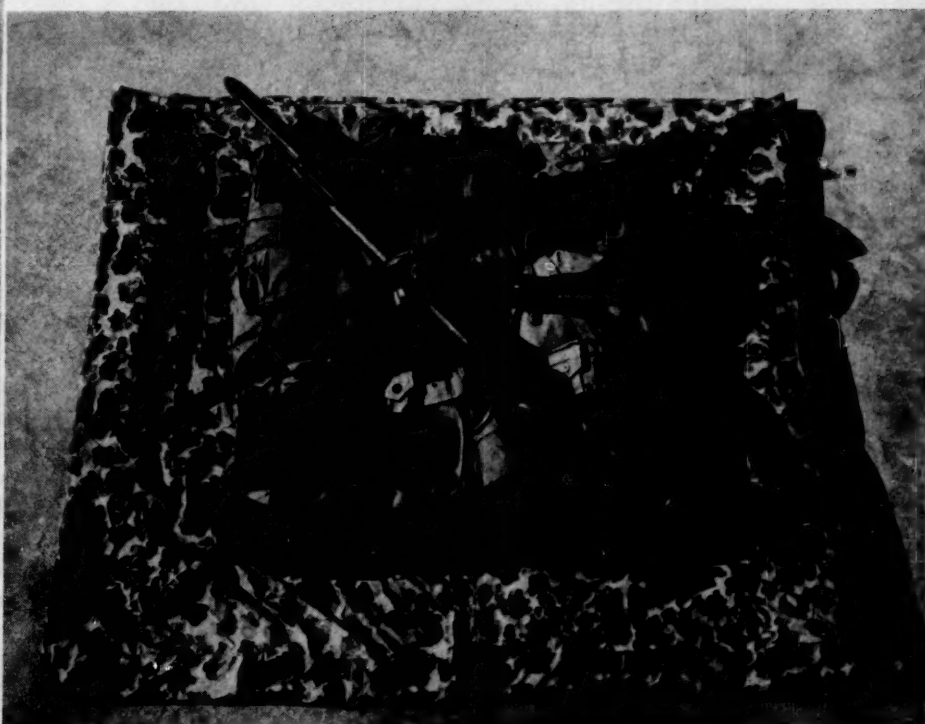
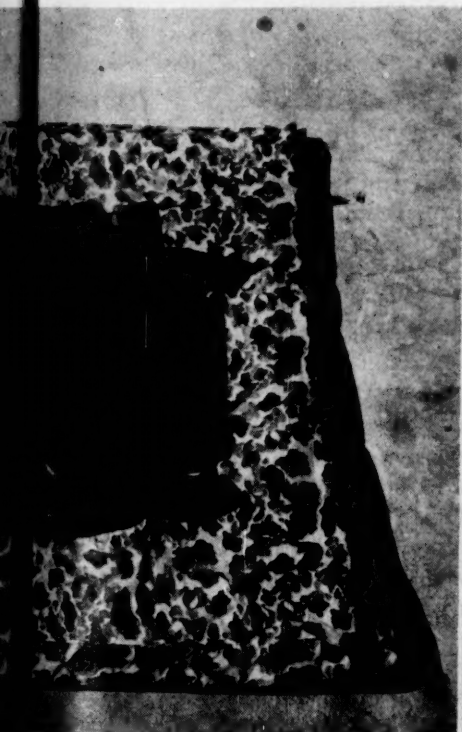
The 2 remaining rifles were crossed, tied and laid on the packs.



Step 5



Step 4



Step 3

The rifles, tucked in the bottom shelter-half were then drawn up over the packs and tied so they could not slip apart. The helmets were tucked down into the loose sides and a guy line used to tie them into the loop holes on one side of the outside shelter-half, then through the bottom holes on the other side. This line insures that the float will stay firm. The machine gun on its tripod (with ammunition) was then placed firmly in the square with the shoes of the tripod slipped down under the rifles.

A float for evacuating wounded is made up of the 2 stretcher bearers' gear making a frame of the rifles and the litter sticks, letting the wounded man himself act as bulk to fill the float.

Under combat conditions the full field transport pack would not be carried by the troops; in this case the floats would have to be made with additional haversacks.

In almost every type of combat where streams or lakes must be crossed, there are plenty of substitutes that may be used. Somewhere near the place of crossing, mortar ammunition cases may be found; either the metal boxes or the wooden cases can be used. Food cartons and boxes also make very good fillers for any of the floats.

The outside shell must be filled or forced out to form a boat or pontoon that will float and carry the assigned load. It may be noted that the more shelter-halves used the longer it will take for the water to soak through. In the case of the poncho the neck opening prevents making large floats, but small floats can be made rapidly from ponchos and often suit the purpose.

Each man should be able to devise a float of some kind if he understands the principle of float or boat construction; the shell — the ribs of the bulk — must fill or force out the shell against the wall of water.

In the event of a future war, our forces are apt to be out-numbered. If enemy planes control the sky, our LVTs and tailor-made stream-crossing-equipment will be at a premium. It will be in situations such as this that the abilities of the troops to get their gear and themselves across with maximum efficiency will pay off.

US MC

LOYALTY—

How far?

By Capt J. B. Wilkinson

THERE IS A GROWING TENDENCY in the Marine Corps for loyalty to stop at a certain level of command. Marines display a great amount of loyalty to their own unit. Commanding officers are extremely loyal to the men in their command. The phrase, "He really looks after his men," is heard when the good characteristics of a staff NCO or officer are discussed back in the squadbay.

But how many present-day officers are guilty of too much loyalty to their men? Impossible, you say? Perhaps it is not impossible and perhaps even you are guilty of this superfluous loyalty from time to time.

An energetic young NCO was requalifying on the rifle range. One morning, while taking a break from snapping in, he observed a private ambling across the field. Now a private ambling anyplace is a common, everyday occurrence, and usually does not attract much attention. But this private had failed to tuck in his utility jacket; had his cap on the back of his head, plus a few turns in his sleeves. To top it off, the private had both hands deep in his trouser pockets. Even to the most casual observer, this individual was not what you would call a representative type Marine.

As you have probably guessed, the NCO approached the private and began the task of what is politely called "squaring him away." Before the NCO could get well started the private said, "If you have anything to say about my appearance tell it to the range officer." This stopped our man cold and before he could compose himself, the private disappeared into the barracks.

At this point who should appear upon the scene but the range officer. He listened while the NCO related his startling story of the salty private. After hearing the story from

start to finish the range officer replied, "My coaches come under my control. When you come out here to fire the range your only worry is if you qualify. My coaches can take care of themselves. Now get back to your task of snapping in."

Undoubtedly, the range officer thought he was "looking after his men." He was looking after his men, but was he looking after the Marine Corps?

Another example of superfluous loyalty was the commanding officer of an independent battalion who refused to permit investigating officers to question any of his men. Several times an investigation was turned in incomplete, because a key witness could not be questioned. The commanding officer's reason for not permitting his men to be questioned was, "They might become a party to the investigation."

Do you feel indignant when someone not in your organization calls you to point out something one of the men in your organization has done improperly? Do you mutter to yourself, "Why don't these people let me run my own outfit? It's none of their business if one of the men in this outfit gets fouled up occasionally." There are many people in the Marine Corps today who think like that, or at least give that impression.

As members of the Marine Corps, each officer and NCO should be concerned with the appearance, conduct and performance of duty of every Marine of lesser rank, regardless of organizational feeling. Loyalty must go all the way up! It must not stop at platoon, company, battalion or other unit. We are all in this thing together. "This thing" being the Marine Corps as a whole, not fractional parts of it.

US MC

To every Marine we have an obligation — to give him a course in the effectiveness of his weapon and the responsibility of using live ammunition in the field

LIVE FIRING EXERCISE



By 1stLt J. W. Kennon

The assault has been on for 36 hours. Progress has been steady, but behind schedule. The enemy is beginning to pile up dangerous totals of reserves behind the force beach-head line. Worse, the division has been compressed too long in an area overdue for atomic attack.

Early in the afternoon, one platoon finds a weak spot—a long narrow valley held only by a 2 bunker position. Behind this position the valley leads upward by easy stages to the high ground that dominates the division front. The valley is not occupied. The enemy regimental reserve which formerly occupied the high ground has been committed. The enemy is aware of this situation

and is bringing up reserves to fill the gap.

The decision lies with the Marine platoon. If they can crack the enemy position quickly enough, they hold the key to the whole division front. But they have to do it. The enemy bunkers are so located that neither air nor artillery can effectively reach them. The naval gunfire team is out of action.

We have one platoon and company mortars; the enemy: 2 bunkered machine guns, protecting infantry—and time. But, our platoon is made up of green troops. This is first combat for 90 per cent of them. The question then, is how effectively have they been trained?

✿ AND THIS POSES THE PROBLEM: How far along towards the frightening confusion of battle can we take men in training? How well can the field employment of their weapons under field conditions be drilled into them?

They say that in the pre-1914 German army maneuvers, one live round was fired in every batch of 1,000 blanks. The practice is said to have had an "encouraging" effect on the conduct of troops.

Now, to our own problems. Men can be shown large scale combat demonstrations so realistic that they are undetectable from battle. They can be exercised in problems using all types of blank and practice am-



munition. Demonstrations of the firing of final protective fires are impressive and educational.

And yet, we have the replacement who won't employ his weapon effectively in combat. And we have men who are days late in applying the lessons of their training to the situation around them.

Is there some lack of realism in training — some element of effectiveness we can add? We have a man whose primary, or only, use of live ammunition has been on the range. To that man, we have an obligation to give him a course in the effectiveness of his weapon and the responsibility of using live ammunition in the field.

Understand me! To my mind nothing can supplant regular rifle range instruction in developing and maintaining skill with small arms. But, can we not take this one step further and give our man this regular field training of live firing in a tactical evolution? Any such attempt at training raises a number of important questions of safety. It is believed that all such questions can be effectively resolved.

The following is an account of how one battalion solved their problem while in reserve in Korea. It is a good example of the least complicated form that such an exercise can take.

The terrain was as illustrated in the sketch. The problem was set up to have the attacking platoon move upland along the valley. Their target was a dummy 2-bunker position set in the base of the nose of a large ridge finger. The floor of "problem valley" was an old rice paddy. There

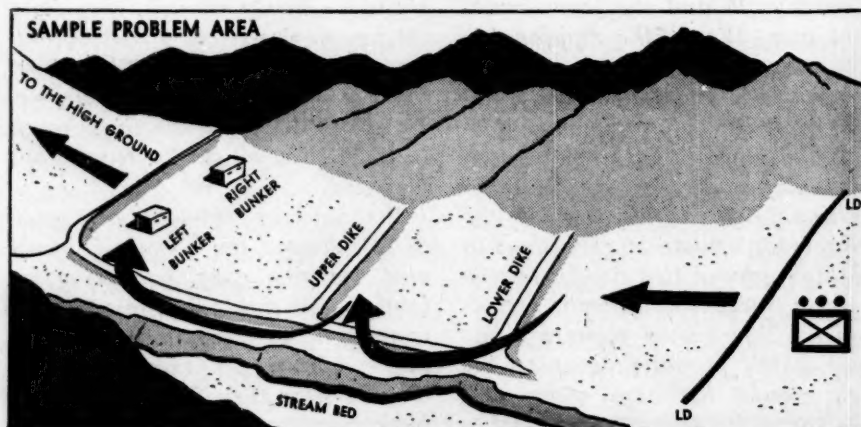
were 2 large dikes across this paddy. One of these — the upper dike — was some 150 yards short of the "enemy" position. The second — or lower dike — was about 250 yards from the "enemy." These dikes formed walls about 4½ feet high which served as controlled firing points. On the left of the paddy as it faced the enemy position was a deep stream bed with a 20-foot bank. A wide ledge about halfway down the bank led from the beginning of the paddy up to the left flank of the enemy position. This "covered approach" was used for advance and envelopment once the problem commenced.

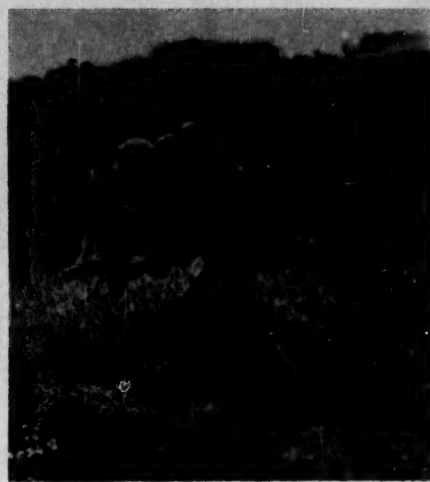
The problem force consisted of a rifle platoon reinforced by an anti-tank assault unit of flamethrowers and rockets. The problem begins with the platoon entering the lower end of the valley. The general and special situation is that already described. The formation is at the discretion of the platoon leader. As the platoon reaches the vicinity of the lower dike they are "fired on" by the enemy (the enemy position is un-

tenanted — sound effects for enemy fire can be easily produced).

The platoon moves rapidly to the shelter of the lower dike — range 250 yards. The platoon is lined up in one rank against the dike. The rocket launcher team takes a firing position on the line. Only the platoon commander and a few other control personnel should be behind this firing line. The order to lock and load is given and — on order — commence firing. All unit leaders exercise their squads or fireteams in musketry against the enemy position. On dry ground and/or with tracers a good comparative evaluation of squad effectiveness can be made.

The rocket launcher is employed right in the line for work against the bunkers. The team displaces along the line for each shot. When the platoon leader is satisfied that his unit has performed effectively at this point, he directs their movement via the creek bank path to the upper dike. This movement can be as complicated or as simple as the





command may wish. It can be cessation of all firing and mass movement to the nearer position. It can involve a base of fire and a maneuver element movement which might even continue firing over the maneuver force as they occupy the new position.

In the instance described, movement was by squads. On order, one squad cleared and locked their weapons and moved off left into the stream bed. The other units continued firing. When this first squad was ready to occupy the upper dike, the lower dike force ceased firing, cleared and locked their pieces. The advance squad was informed that it was safe to move in. As soon as they were in position and firing, the base of fire moved up and filled in on the new line. The initial action at the upper dike was approximately the same as that at the lower with one important exception: the rifle grenadier of each fire team had a quantity of rifle grenades (mostly "frags" on adapters) and at a range of 150 yards had very good practice. The rocket

team again did their work well. When sufficient fire had been laid down, the platoon leader gave the order for the assault.

The flamethrower team and one squad cleared, locked and moved into and up the stream bed. When in position, they threw a volley of grenades and assaulted. The assault team engaged the left bunker first. Their technique was the standard training setup, with the exception that the team was firing ball ammunition rather than blank. The base of fire ceased firing, cleared and locked, when the assault team threw their grenades. All of this was controlled by radio.

That, basically, is the skeleton of exercise. It is an extremely flexible frame. By exceptions and substitutions, it can be adapted to make it safe for the training level of any troops engaged in it. The elements of the problem can be reduced to the point where it is little more than formal range training, or it can be added to until it becomes as nearly like war as can be found off the bat-

tlefield. Second only to combat, it can be made a test of control and discipline. Short of battle itself, nowhere else can a squad or platoon leader become so quickly acquainted with the field abilities and deficiencies of his troops.

Such an exercise should be demonstrated in full to the troops who will run it and they should go through a dry run of the course before firing.

A platoon can run this course from assembly area to consolidation phase in an hour. In general it requires less expenditure of service ammunition than standard familiarization courses would if conducted on a formal range.

The possible additions to the problem are manifold. If it were conducted at a site permanently established for its use, a section of mortars could be added. These could be so positioned that no one would ever be on, or near the mortar-target line at the period of firing. The tubes can be locked in steel and concrete mounts which would permit fire only on one target. The mortar concentration is fired while the problem force is at the lower dike, 250 yards from the M-T line. Before they are permitted to advance, firing must be completed and the tubes dismounted.

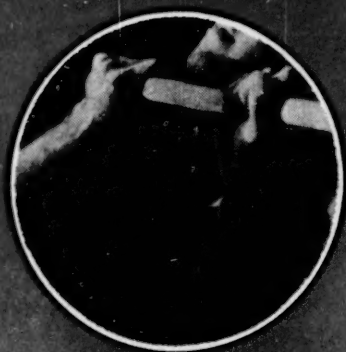
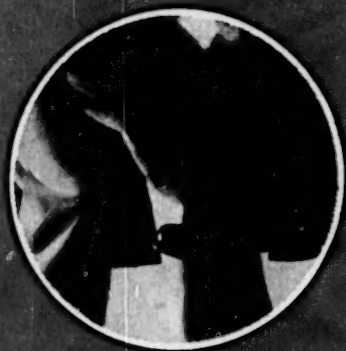
However, the main thing is the idea itself. As training, and as an evaluation of training, such a live firing exercise can be invaluable. It can be made safe, as safe as anything in life is safe, and next to combat experience, it can serve as a post graduate course to range qualification.

USMC



CLOSE

...every move is a close



the hand can be quicker than the foot

—the kick more deadly than the hand

By SSgt M. W. Mok

☛ MARINES ARE HELD TO BE AMONG the best trained and disciplined fighting troops in existence, but one phase of their combat training is all but neglected — the science of individual combat.

Man-to-man combat divides into 2 main parts: fighting with and without weapons. For the purpose of this article, anything from a jagged whiskey bottle to a shoelace, which may be used to kill or maim an enemy, will be considered a weapon. Sharpened garden spades have proved effective, as have sand filled socks and lengths of baling wire. UN soldiers from Turkey taught the Chinese that a keen scimitar has its uses in trench warfare.

Marine Corps training in hand-to-hand weaponless combat has been more or less neglected. An informal survey of troops, conducted on a local level produced 2 main responses. The first was, "I'm pretty handy with my fists," and the second, "Our DI taught us a few holds in boot camp." It was discovered that the average Marine has had perhaps 30 minutes of "pseudo-Judo" from an interested NCO or junior officer under a shade tree at some time during his career.

Snuffy's claim to boxing skill must be carefully evaluated. America is traditionally a land of sluggers, although few Americans can claim intimate knowledge of pugilistic science. The regimen of the boxer is long and arduous, and only a relative minority have the time, opportunity and patience to undergo it.

Thus, the probability of the average trooper being a boxer is slight and the problem of making him one is immense.

But even if Snuffy should have to fight a skilled professional, he need not be lost. First: Snuffy's 10EE boondocker is larger and heavier than the boxer's fist; second, Snuffy's leg is longer than the boxer's arm; and finally, a well-aimed, skillfully delivered kick in the groin region will probably make the pugilist forget his name, to say nothing of his boxing ability. The proper kick does not swing like a pendulum, but is a punch with the foot which carries the body's weight behind it and is delivered with downward impact, like a hammer strike. Fifteen minutes of instruction and 2 hours of practice in kicking makes any man dangerous. A trained man need exert himself very little to shatter a kneecap or end a dynasty. Scientific kicking is the basis of the French *La Savate* (literally, "the boot") and plays a major part in two other systems of mayhem, *Karate* and *Atemi*.

Another simple and effective means of attack is slyly dubbed "The Danish Kiss," possibly because of its popularity and probable origin in Scandinavia. It consists of pulling the enemy forward and down by his arms or lapels and simultaneously driving the top of the head into his face. The man attacked is struck with a "fist" which is some 7 inches in diameter. In a common variant, the attacker drops smartly to his knees and seizing the opponent by

the ankles, jerks them away as he butts him in the stomach with his head.

The outer, or knife-edge of the hand may also be used with good effect against an enemy's throat and kidneys. It is axiomatic that however tough an opponent may be, his neck and surface nerve centers remain vulnerable.

Another attack, favored by *Atemi* experts, is as follows: the right hand is made to relax completely and droop from the wrist. Then with a sharp, backhanded motion, the limp fingers are flicked into the nose bridge and eye area, much as the locker room wag snaps a wet towel. This unorthodox blow causes intense pain and momentary blindness. The follow-through is optional. A typical *coupe de grace* would consist of cupping the hand, striking the side of the antagonist's head in such a way as to split the eardrum, while simultaneously kicking away his legs.

Now for those holds that the Marine may have learned in boot camp or later in his career. Authentic Judo, formulated by Professor Jigaro Kano in 1878 and taught in *Kodokwan* schools in Japan and all over the world, is extremely effective. Unfortunately, even relative mastery of the art takes from 3 to 5 years. To acquire only the prerequisite falling techniques demands several months

of practice.

The charlatans who claim to simplify Judo, teach it in 10 easy lessons, are legion and the outcome of utilizing their "secrets" can be disastrous. One well known pseudo-Judo trick is performed thusly: a man is attacked by a knife-wielding assailant. The enemy attempts an overhead downward thrust. The defender catches the right (attacking) wrist in midflight with his own left

hand. Then by a complex maneuver, the defender breaks the knife-man's attacking arm. The immediately apparent weakness is twofold. First, if the defender fails to catch the attacking wrist on schedule with his left hand, he receives a knife in the chest; or if he does catch it and his opponent is superior in strength, he gets a knife in the chest anyway.

The authentic Judo tactic differs only in one important respect: the man attacked blocks the right (knife arm) with his own *right* arm, at the same time rotating his body 90 degrees. Then if the enemy is superior in strength, the blade can only cut empty air. Razzle-dazzle is sacrificed for safety. Watered down versions of Judo are unsatisfactory and often fatal. Spurious Judo systems are founded on misapplications of Professor Kano's teachings.

It must be concluded that Marines are neither boxers nor Judo men and that to train them as either would be prohibitive both for temporal and financial considerations.

There is a branch of *Kodokwan* Judo which is called *Atemi*. This is rough-and-tumble work, taught to law enforcement officers throughout the Orient. This system combines simple throwing techniques (*Nage-Waza*) with lethal hand-chops, *Savate*-like kicks and blows with knees, elbows and fists. *Atemi* could



Pseudo-Judo, a misapplication of basic principles



Karate — the blow split two pieces of pine one inch thick

be considered as scientific barroom brawling. Most similar to *Atemi* is *Karate*, a weaponless killing system which originated in Okinawa and is now popular in Japan. The 2 methods differ primarily in the way they are taught. Certain aspects of both can be quickly learned.

EVERY MARINE rifleman is issued a bayonet and until recently was being taught the stiff, outmoded parry-left, long-thrust, by-the-numbers routine which was antiquated in 1917. The famous long thrust in bayonet work is exactly equivalent to the roundhouse right in boxing, as it exposes the whole body to attack. A number of excellent systems of bayonet fighting exist: the Biddle flat blade, the Styers method, and Dr Seidler's "boxer's system" (GAZETTE, April 1954); the last being considered by most experts to be the best.

Marines all over the world, assigned security and guard missions are armed with clubs and yet few if any know the proper use of this weapon; and those who do have not learned through formal schooling in the Marine Corps. The very stick that is standard issue for military police is patterned after its civilian counterpart and is a relatively awkward and ineffective weapon.

There are 2 separate methods of enlightened stick fighting which are deadly and sure. A good stickman suits his attack to the situation and sometimes combines both methods. There is the *short stick* system, which is particularly effective in riot control work, or in a situation where the stickman must handle several men at once. Here the stick is held against the forearm with only 2 or 3 inches protruding past the hand.



The savvy stickman avoids overhead blows

The short end is used for striking swift blows to the kidney, solar plexus and other vital regions; while the part of the club which lies against the forearm is employed as a shield to ward off blows. By raising and lowering his arm, the stickman creates a fluid "wall of wood" between himself and his antagonist(s). On the offense, the swiftly jabbing short end is murderously effective. Several men employing this system can cut a swath through a mob as the wind parts wheat. The club does not extend past the elbow, thus denying hand hold to anyone who might want the weapon for his own use.

The *long stick* method requires a larger area and is suited to operations against a single opponent, especially one armed with a knife, razor or bottle. The stickman assumes the reverse of the boxer's stance. His club grasped at the haft, he moves forward in a slight crouch, directing lightning cuts at the antagonist's hands, solar plexus, neck and face. (This approach is similar to the Biddle and Styres bayonet at-

The long thrust . . . is obsolete



tacks.) When the opponent is stunned and disarmed, the stickman closes for the kill.

The purpose of this article is not to indict, but to propose one solution to a grave problem. There are perhaps 40 experts in hand-to-hand fighting in the Marine Corps today; men who have been trained in *Kodokwan Judo*, modern bayonet, *Karate*, knife fighting, *Kendo*, *La Savate*, *Atemi*, or in several of these systems. These men might be called together and formed into a platoon. Through their mutual efforts, a high pressure, ultra-streamlined training schedule would be evolved. The training schedule would be approximately 2 weeks long, demanding 2 hours of training daily. It would encompass instruction in club, knife, bayonet and weaponless combat.

Personnel of the original platoon would be divided into 4-man teams. These teams would be sent first to the recruit depots and to FMF units to train troops. In their daily work, the instructors would encounter other Marines with outstanding natural abilities for individual combat. The Marines demonstrating unusual aptitude would be picked up, given additional training and would be sent to other posts and stations to further promulgate the plan. Through the proposed system of training and recruitment, it is foreseeable that within a 3 year period, all Marines would have completed this training.

The suggested plan might first be tested by putting it into operation on a trial basis. A compact organization such as the very active and justly proud 2d Reconnaissance Company could be selected and trained as suggested. At the completion of the training period, key officers of the 2d Mar Div would witness a demonstration of the new skills and would thoroughly examine the troops in the various branches of individual combat studied. The inspector-examiners would submit their critique and written recommendations to G-3, Headquarters Marine Corps and the G-3 to the Commandant.

Should this plan be adopted, one could envision a bright future—a future in which a Marine would be every bit as rough as he imagines himself to be on that glorious day when he first swaggers forth from boot camp.

USMC

IN APRIL 1951 GEN EISENHOWER wrote a letter to the Standing Group recommending that a college be established for training individuals for key positions in NATO organizations.

In the letter the General outlined the type of person who should be assigned to the school.

He should be, according to the General's wishes, "carefully selected" to become part of a group of officers and civilians who are considered suitable material to be developed into individuals having "a thorough grasp of the many complicated factors which are involved in the problem of creating an adequate defense posture for the North Atlantic Treaty area."

To go on further, the selectee should be capable of adapting himself "to this new environment" and of broadening his outlook "to grasp the essentials of this challenging problem."

In other words, he is supposed to get rid of his national prejudices and see the other fellow's point of view.

Of course, it is not stated this way in the mission. The mission is quite straightforward and prosaic: "... to assist in developing NATO forces into a unified and efficient combat force..." But under cover of this mission is the firm acceptance that first, there must be understanding, and there must be a reconciliation of many different national views. As one officer put it: "NATO is not an organization where you can cram your views down the other man's throat."

The keynote of the NATO Defense College was struck by the Commandant, Air Marshal L. Darvall, RAF, in his opening address to the Sixth Class:

"Your part will be to labor to understand what you hear and to allow this comprehension to modify and vivify your previous views. As I am sure you realize, truth is only relative to nationality, environment, family, occupation and temperament."

It is this constant searching for the *relative* truth that marks the difference between the NATO Defense College and other service schools of higher learning.

There are other differences.

NATO

Defense College

... a constant search for the *relative* truth marks the difference between it and other service schools

By Capt C. H. Amme, Jr, USN

In this College, located at the historic *Ecole Militaire* almost in the shadow of the Eiffel Tower, the instructors do not instruct and the students are not students. The instructors are "Faculty Advisors" and the students are "members" or, *en francais*, "auditeurs." This is significant. It means that the College takes seriously what Gen Eisenhower said. The whole tone of the College is one of a post-graduate research project—a research into international understanding.

The relationship between faculty advisors and members is completely informal. The work at the College is carried on with the minimum of regimentation. There are no books that are "required" reading. There are no examinations and no grades. But there are many opportunities for each member to examine and grade himself on how well he understands the many other sides of the problem.

There is one occasion however, when members are really treated as students. That is during the language class. But they are not alone. The Commandant, his deputies and all the faculty advisors are in the same boat.

Since the 54 "members" (military and civilian) come from 12 of the 14 NATO nations, (Iceland and Luxembourg are not represented in the present course), many speak French better than they speak English. In an attempt to narrow this language gulf, everyone at the College, members and faculty alike, are required to take one hour of either French or English each. The language studied must be the tongue that the member

or the faculty advisor knows the least. This last rule was established when they discovered one American (a Texan by birth) taking the English course!

But language class isn't enough! Very few members are bilingual to the extent that they can understand all of the lecture. Therefore it is necessary to have all the lectures translated simultaneously in one or other of these 2 official NATO tongues. Each member has a headset with a selective switch arrangement whereby he can pipe in either French or English or, in the case of an extremely boring lecturer, he can cut him off entirely! Behind the lecturer, in a glassed-in soundproof booth, the interpreter attempts to match the gestures and the facial expressions of the lecturer as he repeats what has been said in the other tongue. Because of the slight time lag in the interpretation, it is quite amusing to match these syncopated gestures of the interpreters while listening to the voice of the lecturer.

The 5½ month course is roughly divided up into 3 parts: first, there are the lectures by the experts. If there is anything calculated to demonstrate the relativity of truth, it is this. Seldom do the experts agree on everything. Yet it is plainly evident that the area of disagreement is a direct product of differences in nationality, environment, occupation etc. Here, we listen to a brilliant French diplomat explain the whys of French foreign policy. Although his arguments are persuasive, we do not accept them completely. But we do allow them to modify and mollify

our previous views. We hear a powerful "jet-atomic" air force general. We go along with most of what he says, but somehow have a feeling that the war will last more than the 30 days he implies. Our traditional army general succeeds in convincing us that he would do better if he would make use of more atomic weapons and less 155 mm howitzers. Then finally, a renegade ex-Communist makes us wonder if the danger is not perhaps something entirely different from the all-out war we are planning for in NATO.

The lectures furnish the body but the question periods that follow provide the flavor. It is the custom in most service schools for the questions to be short and aimed at clearing up a point or at eliciting further information. But at the Defense College no holds are barred. The questions are sometimes questions in form only. They are often a 5-minute expression of the views of the member, occasionally constituting a rebuttal to a point made by the lecturer. The lecturer has to be very much on his toes during the question period, especially if he has been less than frank during the preceding lecture. The standard Chamber of Commerce speech just does not sit well with the College. But by and large, most of the lecturers weather this period well and are anxious to come again. Those that do not will probably not be asked anyway.

Then comes the lunch.

One of the most important features of the College is the *déjeuner* in the College mess. This can either be considered part of the morning lecture period or part of the afternoon committee work session depending on the interest of the subject. This veritable symposium starts at the bar at 1230 and after a couple of Cinzanos or Tuborg beers it continues under the stimulus of a typical French *repas* including a small carafe of *vin ordinaire*. At 1400, the discussion is carried across the courtyard of the *Ecole Militaire* to the committee rooms where the second part of the course is carried out.

The class is divided into 9 committees each with 6 members of mixed services and nationalities. These committees are devoted to solving some of the real problems currently plaguing NATO. What is

the threat? What is wrong with NATO Command lines? What can be done about the friction between troops stationed on foreign soil and the native populace? There are no school solutions to these problems and the answers are the results of the unshackled exchange of ideas of many different national and service view points.

No translators or interpreters are provided during these committee problems and the hapless American stuck in a preponderantly French-speaking committee is hard put to keep up with the work. But he usually manages to get his views across—to have them challenged by a Norwegian or a Portuguese who understands what he has said.

Some of the most spirited arguments occur and some of the most lasting personal alliances are formed in these committees. The acquaintances made here are nourished during the lunches and flourish during the field trips into ripe and lasting friendships that are the real cement of the Atlantic Alliance. Who knows, these friends might be the leaders of NATO some day. Why not?

The third and, in the view of some, the most important part of the course is the field trips. There is nothing to take the place of going to Athens and hearing the Defense Minister tell of the death struggle that this little country had with Communism. There is nothing like flying up the Oslo Fjord over the place where the German cruiser, *Blücher* was sunk during the 1940 invasion and hearing from the lips of the Foreign Secretary why Norway chose to join NATO and not a Scandinavian alliance. There is nothing

like seeing for yourself the defenses of the Bosphorus, the landing beaches on the southern shores of the Black Sea, the Gorizia Gap in north-east Italy.

Important as this phase is, there is always a battle to obtain the travel funds. Those holding the purse strings seem to measure the value of these trips by the number of lectures heard by the members. Always they come up with the suggestion of having the lecturer come to Paris rather than taking the whole College to hear the lecturer. As if all the lectures ever made on sea power would be one fraction as convincing as one day's demonstration of carrier air operations on the *USS Coral Sea*! As if any lectures in Paris could substitute for "off the record" talks by Gen Mansergh, Adm Fechteler or Adm Mountbatten about their respective NATO Commands.

On these field trips, the members get the "feel" of a country. They "feel" that the Turks will put up a tough fight. They "feel" that Italy will finally lick the Communist element within its people. They "feel," on the other hand, that the people of Denmark do not perhaps regard the Communist threat as seriously as, for example, the people of Greece do.

This "feel" or understanding of the individual NATO countries is the justification of these trips.

Taken all together, the lectures, the committee problems, the field trips fit into the framework or mould carefully designed by the faculty. The finished product is the nearest approach to the *truth* about the Atlantic Alliance that can be learned in a 5-month course.

The truth is not absolute; it is only relative. But it is the kind of truth that the Lord Chief Justice of England referred to in 1853 when he was questioned by Queen Victoria about the reports of the great growth of perjury in the English courts. He replied, "Ma'am, it is not the diversity of testimony that worries me so much as the many-sidedness of truth."

It is the ability to understand the many-sidedness of the truth about the North Atlantic Alliance that the NATO Defense College graduates take with them to their new NATO assignments.

US MC



THE PROBLEM OF UNAUTHORIZED absence, a violation of Article 86 of the Uniform Code of Military Justice, has long confronted the leaders of our Armed Forces. At the present time, a very large majority of the men who are confined in the military places of confinement, are violators of Article 86. Between 1 July 1952 and December 1953 the Army, Navy, Air Force and Marine Corps dropped a total of 73,672 enlisted

men from the rolls as deserters—more than 4,000 a month. In the same period, the Army alone had 305,972 cases of absence without leave—nearly 17,000 per month.

The seriousness of this situation should concern every individual in authority from the commanding officer to the NCO in charge of a section. There are cases everyday of men being UA and the reasons may seem very incongruous when they

are interviewed. The average commanding officer or company commander puts it this way. "There must be something wrong with that man's thinking to propose such a reason for being UA." The reasons presented for going UA, granted, do seem irrational to an observer. But beneath the surface, there is a relative importance that is not easily discerned. The reason is reliable, as such, but the important factor is not

**There is no cure-all for the aches and pains caused by this
ever-present chronic ailment. The existing situation
of men going UA can only be solved on an individual basis**

By Lt(jg) Calvin G. Gardner (ChC) USN

why he was UA, but what transpired prior to this action.

The case of Pvt Smith is typical. He was born in one of the Southern states in the year 1934, attended a Junior High School and finished the 9th grade. At this time, because of his indifferent attitude and a distaste for discipline necessary in doing the required amount of school work, he decided to quit school and obtain a job. This was the start of his independence because he chose, of his own accord, to give up his education. Since his parents were separated when he was 10 years old, and 6 years later his mother remarried, he was his own guide—well on the road to becoming a rash, impulsive young man.

He came into the Marine Corps at the age of 17. What was his record in the Marine Corps? His first offense occurred shortly after leaving Boot Camp. He was found guilty of violating Article 112, (Drunk on duty) UCMJ. His second offense was infraction of Article 86, unauthorized absence for 28 days. His third offense, while at the same duty station, was 7 days unauthorized absence. He was then transferred to the Norfolk Retraining Command. There he fulfilled his obligation of punishment and, upon completion of his sentence, was transferred to a new duty station. Having spent only a few weeks at this new duty station, he went UA the third time, for a period of 15 days. This man is now confined to the brig, awaiting a Bad Conduct Discharge.

In a case like this, there are many administrative procedures and many hours of wasted time—a drain on our limited Marine Corps appropriations. This factor is of interest to all of us but this is not the main concern of top level authorities. The main concern is *not* the paper work involved nor the money spent on the individual, important as it may be. The main concern is the seriousness

of this infraction on the moral structures of our command. It influences our effectiveness as a fighting unit—our only purpose for existence—military preparedness.

Where is the weakness? Are the parents to blame? Is it in our various recruiting stations where men are examined prior to induction? Is it a lack of sufficient indoctrination at Boot Camp? Is it a lack of leadership on our part? Is the UCMJ at fault? Is proper attention being given to the Chaplain's role? These various questions often arise as the mounting numbers of Unauthorized Absentees increases.

It is hoped that this writing will direct your mind to new paths and perhaps provide food for thought. To make this possible, the viewpoints of men who are in daily contact with the offenders, or potential offenders, are incorporated.

A medical officer's relationship to individuals involved in unauthorized absences is of an unscientific nature. It is important for the reader to be aware of this, because it is difficult to reduce this problem to a simple series of examples to which one can apply to the scientific method. From the standpoint of the individual Marine, a medical officer represents a faction that can consider the problem of an individual on a personal basis, whereas a commanding officer must be primarily concerned with his entire command.

It is also important for the reader to understand the function of a Battalion Surgeon. His is an advisory role on administrative matters. He is responsible to his commanding officer and stands ready to offer advice on medical problems, within his jurisdiction. Any contribution a Battalion Surgeon might make would depend on his ability to group unauthorized absences into personality groups, in order to help: (1) the commanding officer to decide what disciplinary action would be

most effective; (2) help recruiting and induction personnel to eliminate incorrigible inductees. In attempting to do this, 3 large groups representing common personality types can be studied. In considering these groups, one must realize that there is considerable overlapping to the classifications and that certain cases, unusual in nature, do not fit into any of the mentioned categories.

The first classification can be termed "the wise or tough guys." When asked why they go AWOL, the story is given that they just decided (often with another buddy and while drinking) that they will go AWOL and take the consequences later. These men know right from wrong. They are mentally stable, usually fairly mature and for the most part have been good Marines. They seldom report to sick bay with other than serious complaints or for maladies requiring prompt attention. These men profit from experience. Punishment in the true sense of the word is rather effective in preventing further infractions. They should be dealt with exactly as they, themselves, expect to be dealt with; i.e., an eye for an eye and a tooth for a tooth.

The second category of offenders may be termed, "Mama's boys." These men often come from homes where their parents have been over-protective. Their every act has been watched, and for the most part they have led sheltered lives. When they were children and were found guilty of some kind of petty infraction, for example, their parents most likely would pat the child on the head and say, "Please, son, don't do that again." These men basically refuse to believe anything adverse can happen to them. They are much like Voltaire's *Candide* who always knew everything would be all right. As a whole, these are creditable Marines if handled correctly. They come to sick bay at the drop of a

hat, but only for real problems. These are the people who always show up for a band-aid when they receive a small cut, never miss having a pain or "cold" evaluated in the earliest stage. This group respects authority but does not take the rules set up by those in authority seriously.

I emphasize this group because they often present such a pitiful picture and are so remorseful for a wrong act that the unknowing sergeant or officer continues to deal with them on a mother-son basis. If this state of affairs is allowed to develop, these Marines will never learn to what limits they may extend their personal desires. It is the opinion of many authorities that the first time a Marine of this type steps out of line, he should be made to suffer the full penalty. These should be no evading of the issue.

This judgment seems hard and cold to the uninformed, but in reality it is the kindest way for a responsible officer to handle this type offender. It is far better to fine, restrict or imprison the first offense, which most often carries a relatively light penalty. Swift, decisive action would, in a large number of cases, work toward producing a good Marine from this type of offender. A very distressing situation that often follows indecisive handling of these men is desertion or another major offense requiring General Court Martial.

The last group we may term the "incurable group." Basically we may use the term "incurable" to describe those Marines who are unable to profit by their experience. Most of the repeated offenders are in this group. These men are quite immature, disrespectful of authority and are emotionally unstable. When evaluated by a psychiatrist, they are usually designated as sane, mentally competent and therefore eligible for trial.

The typical man comes to sick bay constantly, complaining of headaches, insomnia, backache, foot pain, gastro-intestinal disturbances or any number of other vague aches and pains. Repeated physical examinations, laboratory studies, X-ray studies and specialty consultations are reported negative. This group should never be allowed to join the

service, and the question is asked, "Why can't they be screened at induction centers?" The answer is a simple one. When a man presents himself voluntarily, as most Marine Corps personnel do, he is at his best. It would be very difficult to tell just what his reactions would be on snap judgment. The degree of instability and immaturity is hard to judge on one examination. The problem then arises of what to do with these people. Should they be punished? Yes. They should stand trial for their offenses and be punished accordingly.

The error often made after the man has paid the consequences is to put him back into his original situation; i.e., military service. These people were grouped as "incurable;" they do not profit from experience; they never learn. They should be separated from the service by administrative discharge because of unsuitability. This is an ideal way to handle these cases. The men are not insane; they are not dangerous to other people or physically to themselves. They require no psychiatric treatment. The ardent psychiatrist or sociologist will question this last statement, but after repeated trips to numerous psychiatrists, not one such individual has responded as a natural subject of psychotherapy. These people have been nothing but trouble to themselves and to the service since enlistment. Is it best for them to be discharged under medical survey and thereby receive all the benefits of a man who has performed creditably? Or, should they be penalized for their unfortunate personalities by resorting in every case to a Bad Conduct Discharge? Would it not be best to take the middle course, i.e. releasing them with administrative separation under terms that would neither reward nor penalize. But, above all, let us reiterate that failure to remove this man from the service is to create a group of men who will very likely continue to be disciplinary problems. Numerous officers and senior NCOs will say that this can't be done; that we'd be swamped with people trying to be released from the service.

However, our man is relatively easy to pick out. He is of the group that usually have trouble in Boot Camp and get a psychiatric physical

profile of Grade 2 or 3; they often wash out of service schools for lack of motivation; they have numerous office hours; they are repeatedly receiving non-judicial punishment; they often come to sick bay for unreal complaints. It is the chronicity and repetition of complaints and offenses, coupled with emotional instability that provides an easy delineation of this group.

There is a significant reason for the correlation or pattern between UA's and broken homes. Men who come from such environments have not learned moral standards that are necessary in life. If they have, they have seen them contradicted in their early, formative years. Man is constantly in need of a standard, also a person in which to have confidence. A young fellow, for example, has lost his father through divorce. He now turns to his mother for confidence and guidance. His mother becomes his standard and guide. She remarries and at once the young lad sees his world crumble about him. His mother shows interest in someone foreign to him. His mother no longer holds his confidence. He becomes his own guide—his own standard—a rash, impulsive young man. Because of his search for adventure, or to get away from it all, he enlists in the service, usually at the earliest age possible, 17. He finds in Boot Camp that his new counselors or guides are NCOs, 1st sergeants or officers. The crucial point comes when he loses confidence in these men, and again becomes his own guide—his own standard—the rash, impulsive young man, once more showing through the temporary veneer. In his old form again, what else could be his course, but a distorted and quick decision, not realized to be such a great offense until committed and seen in retrospect.

Is it a lack of leadership on our part? Leadership is a quality that is not so much hereditary as it is a result of hard work and diligent practice. We in the Marine Corps are just as aware of the necessity for leadership today as 35 years ago, but because of the ever-pressing problem and the infractions against the Code, we begin to realize the constant need for even better leadership. We believe that infractions against the

Code can be curbed by good leadership.

The promotion from Pfc. to corporal and above, is a recognition of certain desirable traits of leadership. A step from the private class to the realm of the NCO is a very important step for the Marine. With such graduation, there is a need of fully introducing these people to their full responsibilities and the recognition that is due them. The tendency today, for some reason, is to give less recognition to our NCOs and especially our junior NCOs. This is critical, because the NCOs who have the closest contact with the men are these; the men who will give the greatest aid in combatting the problem at hand. Interviews with corporals and sergeants who are in direct contact with the potential UA will reveal a few of the problems that are existant, which, if alleviated, may lose their power as a factor in producing unauthorized absence.

The training schedule is well-rounded militarily. The program of sending men to NCO Leadership Schools is commendable. But there is a need for leadership classes to be incorporated in the training schedule. It is well to train a man to be a good combat leader; but he must have good men to lead. A Marine must be reliable and trustworthy in combat; he must be relied upon in all places and at all times. And it is up to our NCOs, their immediate leaders, to impress upon their men by example and by command. To be capable of doing this, our NCOs need more frequent indoctrination than can be given at the traditional NCO Leadership School. Therefore, in reiteration, classes to accomplish this aim should be integrated with the training schedule on a regular basis.

It is granted that our leadership can't be blamed for all infractions against the UCMJ. These infractions are, as pointed out before, a result of a chain-reaction began back at home level. But the fact remains that these men are now under the jurisdiction of the service and the UCMJ. Their lack of respect for authority and their leaders cannot be excused. It must be remedied and the problem nipped at its roots. The answer is our junior NCO. Theirs is the job of encouraging the men to

become good Marines—by example and by the authority vested in them. A good NCO doesn't have to be considered "just plain Gung Ho" to desire a well-knit unit under his charge.

"Train the child in the way he should go and he will not depart from it when he is old," is a proverbial adage that can be paraphrased more timely to read: "Train your men to be good Marines in peacetime and they will not depart from their ways in combat." We are achieving this end from a tactical standpoint. Let's go all the way and provide better leadership of the men on a personal level. Their responsibility to leadership is no less in peacetime. We can have better leadership of our men; and especially a closer check on our potential UAs. The plan is in our hands—let's carry it out.

It was, and still is, General Thomas J. "Stonewall" Jackson, who provided a good example of leadership at its best. He was a "hard-charger," and his men realized the toughness of his command; but they also realized that he had their interest and welfare at heart; that he prayed for them at night; that he believed in direct leadership and example for his men. He kept his men "in line" on the battlefield, but also in their pup tents. He was a thorough leader. We have many NCOs today who are thorough leaders, who believe in a well-knit, satisfied, confident group; we need more—many more. A chain is as strong as its weakest links. Let us strengthen our links in the chain of command.

Let us examine some of our other questions:

Is it the Uniform Code? The Uniform Code of Military Justice, effective on 31 May 1951, was devised to integrate the various forms of military justice in effect at that time in the Army, Navy and Air Force. It can be said that the Code has achieved this end.

There is, however, much more to the code than merely supporting orderly government and discipline in the Armed Forces. The Marine Corps is required by law (Article 137, UCMJ) to explain to each man, (1) upon entry into the Corps, (2) 6 months after, and (3) upon re-

enlistment, Articles 2, 3, 7, through 15, 25, 27, 31, 37, 38, 55, 77 through 134, and 137 through 139. This requirement is met in the Corps by means of the lecture and film presentation method, during the Boot Camp phase of each Marine's military life. On paper, this appears well and good; to comply with the law. But in actuality how does it work?

Picture a Boot at Parris Island, or San Diego, marching with the other members of his platoon to the area for a lecture on the Uniform Code. This Marine has been up long before the rooster, policing the barracks, eating chow on the run, exercising under arms, "trooping and stomping" on the drill field and so on. This man is tired, to say the least; sweaty and "shook." And here he is, listening to his DI, or one of his officers explaining the Code. Physically, and mentally, he is tired; he hears only a dull monotone going on and about AWOL, UA, ad infinitum. In his state, nothing complicated penetrates his mind.

At his next duty station, he again has the required articles explained to him, or does he? A close check of Service Records will many times show on page 11 only one entry, made at Boot Camp. The reason for this can be said to be that the administrative work load is such that this vital explanation was overlooked in carrying out *more important things*.

Is there a way to remedy this situation? Yes, there is, and it is a simple one: take enough time at Boot Camp and again at the next duty station to explain the Articles simply and reasonably. Do it at a time when it will be the only thing the man has to think of. Set it up on the schedule, say, for a half day, when you can bring the platoon together as a unit. Arrange to have a suitable site for the explanation, where the men can relax (but not too much), and by all means, take as much time as is needed to adequately get the points across to the men. Answer all questions if possible, or refer to an authoritative source that can. Stress, perhaps by the cause and effect method, the importance of the Articles on AWOL and desertion and missing military movement. If such steps were taken

initially, the UA rate could be cut and save the Marines involved grief and punishment in the future. The administrative time now spent in processing disciplinary action could be used to provide a greater combat potential.

Is proper attention being given to the Chaplain's role? Recently, a field officer expressed an opinion that violation of Article 86 was a direct result of the attitude and psychology of our youth today. In other words, our young men lack "home-training;" having a lack of proper discipline in their backgrounds, they cannot be expected to readily conform to a comparatively new way of life. And this is granted, but the fatalistic attitude must not be taken. It is time for an aggressive step or steps in the right direction. We must meet the problem where it exists. We are not going to take a fatalistic attitude and say that we must go with the tide.

The spirit of this age is something to be concerned about, and unless we take a personal interest in this enigma, we will meet the spectre of it in the field, which is catastrophic and inexcusable. The Korean situation has shown a weakening of something that is far too important to lose: the price of moral integrity over personal safety.

AWOLs are a moral problem, or should we say, a character problem. Character is something which is quite intangible, yet distinguishes the strong from the weak. Character is not inherited, but is appropriated by environment and the will. It is saying "no" to oneself, when strong outside forces try to compel the will to say "yes." It does not take a Chaplain to instill or introduce good character traits. This is a responsibility that is often cast at the Padre's doorstep, "here, you take this: this is your field." Granted, it is the Chaplain's field, but it is the commanding officer who assumes responsibility. It is the commanding officer who is challenged when there is a long list of UAs.

The Armed Forces are today required to have Character Guidance on the top of priority for training—one hour per month per man. The training schedule is very meticulous to include Character Guidance, and the command does everything in

their power to assure proper attendance. But this does not mean that Character Guidance is reaching the masses. It means that the Chaplain has the opportunity to go to a certain designated area, and according to the training schedule, give a lecture to a representative group of men. Judging by the attendance, all are not reached.



This presents a challenge to the Chaplain. This is a time for the Chaplain to experiment. Is it possible that instead of expecting the men to come to a designated area, that the Chaplain carry Character Guidance to the men where they are—in the shops, in their areas of activity, or in the field? Could a plan be devised to have an itinerary so that he would be able to circulate amongst the various groups of his charge and be given just the time necessary for a lecture? The Chaplain would thereby be saving time on the company level, and at the same time be able to reach the officers and men alike. The importance of the moral aspect must be realized. We are all affected by the aspects of infractions and we must keep up the team spirit and work together to enforce our regulations, written and unwritten, moral and judicial.

We today are faced with a great challenge. It is not a time for dreamers; it is a time for constructive experimentation. We must be willing to try new methods, new ideas to cope with our problems. For personal and team pride in each unit it is suggested that posters be placed in all barracks with names and the infractions of the UCMJ. Actual case histories of violators

should be given in renewed lectures. After Office Hours with the company commanders, the Chaplain could interview all men who for any reason violate the Code. Sometimes the apparent reason is merely a result of an inner conflict which the Chaplain can uncover if there is personal contact with the individual. Once the real reason is perceived, perhaps adjustment can be made.

A meritorious mast is suggested for the most outstanding man in each company in the manner of an appearance before the company commander for recognition. Various points for judging the individual could be:

- (a) Military decorum (neatness and appearance)
- (b) Attitude
- (c) Disciplinary Record
- (d) Influence on men in his group (morally, etc.)
- (e) Leadership qualities

A little constructive experimenting will bring up many more ideas, all aimed at better morale, better morals, better mutual accord, better mental attitudes, better management and better Marines.

We have presented and discussed this problem of UAs; we have given several reasons why men go UA; and we have also suggested some possible solutions to this situation. Do we have a cure-all to offer to this perplexing and demanding problem? No, emphatically, no. There is no cure-all for the aches and pains caused by this ever-present and chronic ailment. This existing situation of men going AWOL or UA can only be solved on an individual basis. It's up to the team: the company commanders, platoon leaders, 1st sergeants and the junior NCOs to seek a solution to this problem in each particular area of command. The Chaplain, of course, has a vital interest, but the direct burden of command, of ever-present example rests primarily on the unit leaders.

The problem has been outlined; are you, as a leader, capable of displaying the qualifications of the true leader in this time of crisis? Let's go for a better Marine Corps. We can do it. Let the memories of the "Old Corps" be held in reverence; but let the pride in the "New Corps" be justified. We are a team. Let's go for a touchdown! USMC

in brief

✦ The Navy is due to get the first seaplane ever designed as a minelayer — the XP6M Martin Sea Master (below) which will be flight tested at Baltimore. The new swept-wing plane will be capable of speeds over 600 mph and will be able to carry a pay load of 30,000 pounds. It can be refueled by a submarine tanker and therefore has a tremendous amount of mobility and elu-

✦ A new miniature radio (right) is being tested by the Army at Fort Carson, Colo. The receiver clips to the edge of the helmet and the Army plans to use it to radio instructions to small unit leaders. It is a receiving unit only — it can not transmit.

✦ A color radar system, capable of distinguishing between friendly and enemy aircraft, is now undergoing evaluation tests.

The new color radar can now indicate the position of unidentified aircraft in 2 colors (depending upon flight altitude), over the earth's surfaces.

The radar indicates aircraft as colored



✦ Scientists from the Army Quartermaster Research and Development Laboratory have been working with the Naval Field Medical Research Lab at Camp Lejeune to develop a new-type armored footgear. Tests included exploding antipersonnel mines under the new mine-resistant thermal boot which has a specially constructed sole. One of the officers working on this project to protect the feet and lower limbs against mines is Cdr F. L. Lewis, who was instrumental in developing the armored vest for the Marine Corps.

✦ The Tactics and Techniques Board of the Marine Corps Development Center has been embarked on a program of overhauling old manuals and producing new ones.

New publications, now at the printers, include LFM-0, *Presentation and Scope of the Landing Force Manual Series*; LFM-25, *The Tactical Air Control Party* and *Landing Force Bulletin-2* (Revised), *Interim Doctrine for the Conduct of Tactical Atomic Warfare*.

In addition, 20 existing LFM's have been reviewed by the Development Center as well as Fleet Marine Forces and recommendations submitted to HQMC. CMC has taken action on 13 of these and the Editorial and Manuals Section has gone to press with 2 of the revised versions: LFM-2, *Terrain Hydrography and Weather* and LFM-18, *Troop Life and Training Aboard Ship*.



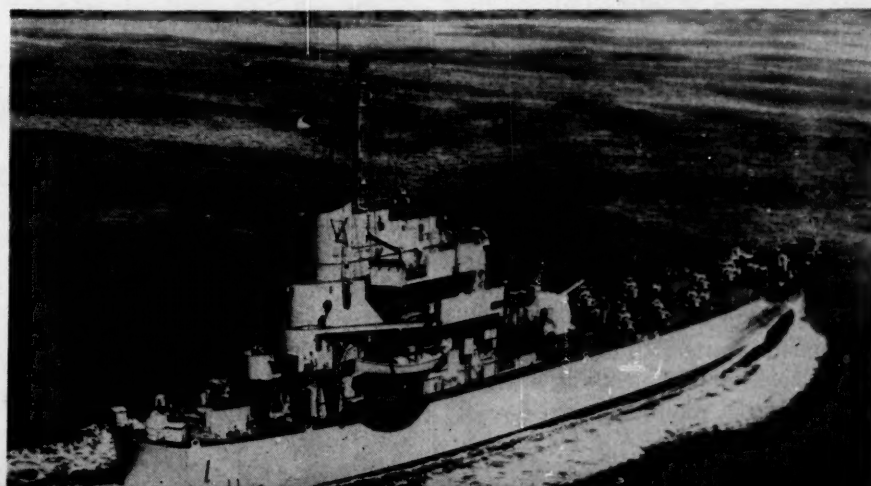
siveness, making it possible to provide a guerrilla-type operation for sea forces.

✦ Marines who participated in operations in northeast Korea, Nov-Dec 1950 are invited to relate their story to the Historical Branch which is now preparing Vol III of the *US Marine Operations in Korea*. Accounts of platoon actions are particularly desired from both enlisted men and officers. Address your letters to Historical Branch, G-3, HQMC, Washington 25, DC.

✦ Looking familiar, but yet unusual, the USS *Carron, de* is the first of a new-type vessel to replace the LSMR as the Navy's inshore rocket fire support ship. Recently the subject of much comment in the press because her interior was designed with the latest improvements for shipboard habitability, her configuration is new to Marines travelling in convoys with elements of the Navy's amphibious fleet. She is shown (right) undergoing sea trials in Puget Sound.

dots traveling over chartreuse-colored land areas.

Planes flying at high levels over the colored land areas are indicated in bright orange while those flying at lower altitudes show up with a more greenish hue. Current radars now in operation, indicate aircraft only as colorless blips at any altitude.



A STUDY ON STUDIES

**A study, like cheese and wine, takes time
in the making if it's going to be good**

Anonymous

Study—A rendering of anything, made as a result of careful and detailed investigation or observation.
—Webster.

LONG DECEASED LEXICOGRAPHERS would writhe in their graves if they but knew how the military services have corrupted their lovingly wrought definition. In its pristine, unsullied state, a study was a thing of noble repute.

The study was the province of scholars, scientists and all manner of erudite men. It was their working tool for adding to the sum of man's knowledge on every conceivable subject; from the dimensions and shape of the universe to the mating habits of the fruit fly (*drosophila melanogaster*). A man's professional reputation usually hung on how well the published results of a study withstood the searching and critical scrutiny of his associates.

This being so, a study was not a haphazard affair, hastily fabricated from odd bits of factual information found lying around, unverified source material, perhaps an original thought or two and liberally colored by the maker's preconceived opinions on the subject. The study was, and is, in the mufti versions, a solid work of weeks, months, or years — or

even a lifetime. It has long connoted painstaking thoroughness, exhaustive research or investigation, sound reasoning and complete intellectual honesty.

What manner of thing is this then that the nation's men-at-arms call a study? Alas, it is a sorry, bedraggled thing of ill repute. Even though we make more studies per capita than any other group of humans, we ourselves view all but a scant few of them with a cynical tolerance or open scorn. (It has been estimated that the annual output of studies in the Armed Forces would fill a row of filling cabinets from Camp Lejeune, NC to the Pentagon.) All echelons below that making a study know for sure that the study was made by an illiterate and incompetent staff officer who knew far less about the subject than they do. At this time, a well made study would undoubtedly reveal, without fear of contradiction, that the average military study does not bear the good name that its more fortunate sisters in the other arts and sciences do.

If the myriad studies that unceasingly roll from our clacking typewriters and metronomic mimeograph machines are in large part shams, to what may we ascribe their

disreputable state? It is my finding that there are two general causes for this lamentable condition. In order that they may be properly identified, and from henceforth on recognized and scrupulously avoided, by all makers of studies, let us label them Cause Able and Cause Baker.

Cause Able, is the common semantic error of *misnomer*. The term, study, has been fashionable in the military lexicon of recent years and has been widely misused as an appellation for staff papers of every description. Hosts of our studies are nothing more than routine staff papers, with none of the qualifications of a true study. Usually the deceit is entirely innocent and unintentional. The officer preparing the paper made no pretense that his work was the genuine article, he simply called it by the term then vogue for such a paper. In a minority of cases the deceit is the device of the staff officer who desires to impress everyone with the importance of his work and himself. So he classifies everything he does as a study, to lend it the desired aura of importance and significance — and often carries it about in a bulging brief case.

This misnamed class of staff work is often necessarily subjective in approach instead of objective, as it is mandatory in a study; it is often prepared from the documentary, or personal experience and knowledge sources readily at hand, instead of from the results of exhaustive research of all possible source material; it is often superficial instead of penetrating. In other words it is staff work that is not, and often need not be, prepared in accordance with precepts of making a study. If we recognize this type of staff paper for what it is, and cease and desist from calling them studies, we will have gone far towards rehabilitating the study.

Cause Baker, is a chronic staff ailment, poor staff administration on the part of the commander and his principal assistants. It acts to produce a pseudo study instead of the real article in cases where a good solid study is required. The major contributions of a commander and his acolytes to the sabotage of a credible study are: not allowing enough time for its preparation, de-

signating an unqualified officer to prepare it, and trying to make a study beyond the capabilities of the staff. Diogenes himself could not find the staff officer who has not heard the dread words, "Smith, I wish you would make me a study on this matter. Have it in to me at 1600 day after tomorrow." Poor Smith returns wearily to his desk, glances dejectedly at his high-piled "In" basket, sharpens a few pencils, pulls a pad of scratch paper in front of him and either starts writing furiously or gazes off into space waiting for an inspiration. (By long standing military custom and tradition, the time allowed to make a study has been set at one-fourth or less of that the man assigned the job thinks he needs.)

A study, like cheese and wine, takes time in the making if it's going to be good. Remember that Webster said a study was the "result of *careful* and *detailed* investigation or observation." The all too familiar "quickie" study may resemble a good study as well shined brass resembles gold, but it is of the same relative value too. It might pass as a good staff memo but degrades the study.

Much of the success of any study depends upon the man, or group of men, who make it. General military background, special qualifications in a pertinent military field, intelligence, judgment and the necessary intellectual aptitudes for making a thorough study are all important factors in selecting officers to make a study. A broad military background of varied experience and duty will help to prevent a waste of time and energy in the investigation of matters that have already been thoroughly explored, or the arrival at impracticable conclusions and recommendations.

A thorough knowledge of the subject under study, especially where it requires the technical knowledge of some particular military field, is most desirable. If the subject is a hotly controversial one, care must be exercised that the study does not become the vehicle for presenting the case of one side only. Equal representation of all sides with an impartial referee is necessary. That intelligence and judgment are mandatory for the preparation of a sound study goes without saying. Not so

widely recognized is the fact that every officer is not naturally equipped by nature with the mental attributes required to make a study. The facile, intuitive staff officer, or the rugged, dependable field soldier may not be best qualified to perform the drudgery of intensive research, to make well reasoned analyses of the facts ascertained, and to present the demonstrable conclusions in an understandable report.

Every staff does not have the qualified personnel or the necessary reference material to enable it to conduct a study on every conceivable military subject. But that fact seemingly has never deterred a staff from making a study of the burning question of the moment.

As a commander must know the capabilities and limitations of material and organizations, so must he know the capabilities and limitations of his staff to provide him information and advice. Where it does not possess the qualified personnel or source material to make a study on a specific question he should refer the question to a staff that is capable of preparing a reliable study on the subject.

What evil results from our endemic afflictions, Cause Able and Cause Baker? Basically it is the same in both cases — not giving the commander (or a higher headquarters) complete and accurate information, and misleading him as to the authenticity of the staff work submitted to him. In cause Able we vest an informal staff document with a spurious importance and validity by labeling it a study. In Cause Baker, we defraud ourselves by not producing the trustworthy document we required. In either case we have made a product of pewter or silverplate and called it "Sterling." If a commander values a study as a shining light in the darkness, to guide him safely to a sound decision, his trusting reliance may run him aground if he must steer his course by the products of Cause Able and Baker.

This evil is not confined to the commander to whom the document is submitted. Since the typewriter and mimeograph replaced the goose quill pen, staff papers have developed a wanderlust commonly called "distribution" that takes them far and wide. The study of today may

be source material for the study of tomorrow. There may be those in the same staff generation of the headquarters that produced the study who were doubting Thomases as to its validity; but the next staff generation or another staff, may accept it in trusting innocence as the Word. (It is an amazing coincidence that a "staff generation" and a mouse generation are about the same, approximately two years. No deductions are made here from this fact, but it might be worthy of a scholarly study.) Shakespeare to the contrary, there is something in a name. So our first step in raising the repute and value of the military study should be to stop the loose and indiscriminate use of the term. Those staff papers that represent the personal opinions, ideas, or recommendations of one man (or a staff) and that are not based upon extensive impartial investigation or research should be called by another name so that they may be evaluated accordingly. Such papers have a definite place in staff work, but should not be confused with, or receive the same acceptance as a staff study.

To make the study an authoritative work that may be used with the utmost confidence we must insure that sufficient time, facilities and competent personnel are provided for its preparation.

For a study to have other than itinerant value to the immediate commander and staff concerned, it should be fully documented throughout. A most desirable feature would be a bibliography listing all documents consulted, persons interviewed, places visited and events witnessed in the preparation of the study. The information gained from each such source should be briefly stated if it is not given in the body of the document as source material. In addition, a bibliography of similar source material known to exist, but *not* available in the preparation of the study, might be given.

War may be both an art and a science as we tell ourselves so often. If so, it is time, in this scientific age, that we acted more like scientists and less like artists. Decisions based on facts, not on intuition, win wars today. Hitler proved that. So let's hold field day on the military study and make it a fact producer! USMC

CAREER PATTERNS and MORALE

Good morale does not necessarily stem from "good" duty and comfortable living. Policies that promote true morale do not have to be compromised with service attractiveness

By Capt J. E. Greenwood

☛ DURING THE PAST DECADE, FEW aspects of military life have received more universal attention than the problem of morale. The word morale has been widely used in both military and civilian circles and it is unfortunate that this usage has been as indiscriminate as it has been extensive. It is evident that this development has caused considerable confusion in our thinking and has seriously obscured the principal issues of a major problem.

S. L. A. Marshall calls morale "the body of thought of a person or persons, as to whether it disposes the thinker to high endeavor or toward failure. . . . Morale is the thinking of an army." W. E. Hocking said that "what condition is to the body, morale is to the mind. Morale is condition; good morale is good condition of the inner man: it is the state of will in which you can get most from the machinery, deliver blows with the greatest force, take blows with the least depression, and hold out for the longest time." Ardant du Picq considered morale to be the integrated sum of all the factors that can make men overcome

fear, control their desire for self-preservation and fight with maximum energy.

It is the idea conveyed by these definitions that is important. As long as we can appreciate this idea it makes little difference whether we elect morale, esprit de corps, or still another word to describe it. Certainly comfort, ease and contentment appear to conflict with the definitions above. These elements fall into the class of luxuries and it frequently appears to be the nature of man to accept them, adjust to them and consider them his due rights in a remarkably short time. It is inevitable that adverse conditions, danger and hardship of any sort will breed self-pity in a man accustomed to such luxuries. Such a frame of mind is incompatible with our definitions. Morale in its original sense cannot be divorced from combat efficiency. We might conclude with considerable accuracy that a working definition of high or good morale is the absence of this self-pity.

Ardant du Picq suggests the twin fields of organization and doctrine as keys to an intelligent and bene-

ficial discussion of morale. Organization and doctrine are concrete, tangible elements that can be revised and improved until they provide a fertile soil in which morale can grow.

In order to furnish a degree of factual support for this discussion and to illustrate one of the many tangible links that tie organization

RESEARCH AND BIBLIOGRAPHY

☛ The factual evidence upon which this article is based was extracted from 51 volumes of the *Register of the Commissioned and Warrant Officers of the United States Navy and Marine Corps*. This *Register*, showing duty assignments of all officers, was published semi-annually from 1890 through 1907 and annually thereafter. Except for 1898 only the 1 January issue for each year was utilized. The 1 July issue of that year was included to provide information on Huntington's Battalion in Cuba during the Spanish-American War.

and doctrine to morale, it was felt that a study of officer careers might prove helpful. Because of its outstanding reputation as a first-class fighting team, its long and active history, its traditions for high esprit de corps, and its smaller size which permitted more complete analysis, the Marine Corps was an obvious choice to provide the data for this undertaking. Information on duty assignments was compiled on all officers entering the Marine Corps during the 15-year period, 1890-1904, providing they served for a period of 2 years or longer. A total of 242 careers were traced from their beginning date until 1941 unless terminated earlier by retirement, death, resignation or dismissal. These careers were then evaluated by seeking answers to several questions. Did the careers have a pattern? What kind of duties, training and experience prepared the leaders for combat? How rigorous was the career? What relationships existed between different leaders? Do the careers provide any indication of the officers' attitude? What was frequency of transfer, duration of duty overseas, etc? In general, this study substantiated the basic premises outlined above and it confirmed the concept that organization and doctrine exert a fundamental influence on the quality of morale. The specific findings, which lead to these broad conclusions can be classified under 3 headings: Career Patterns; The Art of Tactics; Familiarity and Unity. It is felt that these findings demonstrate

a somewhat neglected but highly effective means of approaching the overall morale problem. Perhaps this is the only means of morale analysis that holds forth a realistic promise of reaching the goal of better morale in fighting units.

Career Patterns

THE OFFICERS ENTERING THE Marine Corps from 1890-1904 could not look forward to careers of ease or comfort. They averaged 7 transfers during the first 10 years of service and 6 of those years were spent either on sea duty or on a foreign station. All officers did not experience this average, however. There appear to be at least 3 general patterns that a career could follow. These patterns can be expressed as: barracks duty (including overseas posts) — sea duty; sea duty — Washington, DC duty; and barracks duty — Washington, DC duty. In addition, are the careers of those officers assigned to what normally was permanent duty with the General Staff or one of the 3 components into which it was broken in 1903: Adjutant and Inspectors Department, Paymaster Department and Quartermaster Department.

In spite of certain exceptions, it is evident that the officer whose general pattern involved primarily barracks duty and sea duty was apt to spend somewhat more time outside the continental limits of the US than would any of his brother officers following one of the other patterns. It would seem that the closer an officer approached a pattern in-

volving duty in Washington the less rigorous his career became in terms of foreign duty, frequent transfers and possible separation from family and comfort. These officers were categorized by the term "Washington Marine." The extreme of this category was reached when an officer was assigned to one of the staff billets mentioned above. Such an assignment occasionally permitted duty at a single station for periods of 20 years or more. At the opposite pole was the "Expeditionary Marine," the officer who, one way or another, participated in virtually every expedition or action occurring within the span of his service.

It should be remembered that during these years the Marine Corps was an extremely small organization. On 1 October 1890 the total strength was 1,950 officers and men. While WWI expanded the Corps to 43,000 men, by 1 October 1920 it had been reduced again to 529 officers and 17,559 enlisted men. For 10½ years, 1894-1904, G. C. Reid was adjutant and inspector with the rank of colonel. Both Reid and Lauchheimer, who followed him as adjutant and inspector, did much to implement sound administrative policies. These men were largely responsible for officer assignments. In view of the small size of the Corps, they were able to know a great deal about each officer and more often than not they knew him personally. With such personal administration in a small closely-knit organization, officers were able to exert more influence

It was found necessary to supplement the above source by reference to 3 other major works: "Report of the Commandant of the United States Marine Corps," *Annual Report of the Navy Department*; Capt H. A. Ellsworth USMC, *One Hundred Eighty Landings of the United States Marine Corps*; and Metcalf's *A History of the United States Marine Corps*. These were used to furnish general historical background for the period covered.

Tabulation of research was both lengthy and awkward. It was found that the 242 careers traced involved 328 different duty assignments. Each of these assignments was given a

number and careers were followed by recording the appropriate number for each year of service. After this tabulation it was possible to begin evaluation.

Several weaknesses remained in the final results. Most important are as follows:

- 1) The survey was limited to a 15-year span. If this were to be extended, not only would the factual basis be increased, but also additional information on the relationship between junior and senior officers would be available.
- 2) It was necessary to omit information on three expeditionary forces from the analysis. These were Cuba, May-

July 1912; Nicaragua, August-November 1912; and Mexico, February-June 1913. These expeditionary forces had returned to normal duty prior to publication of the *Register* for the given year and no information was included.

- 3) Aside from listing commanding officers of principal units and stations, the *Register* did not indicate specific assignments. More detail on the exact nature of duties would be of great value.

In spite of these weaknesses it is felt that the conclusions are sound and would certainly survive if not be strengthened by additional information.

USMC

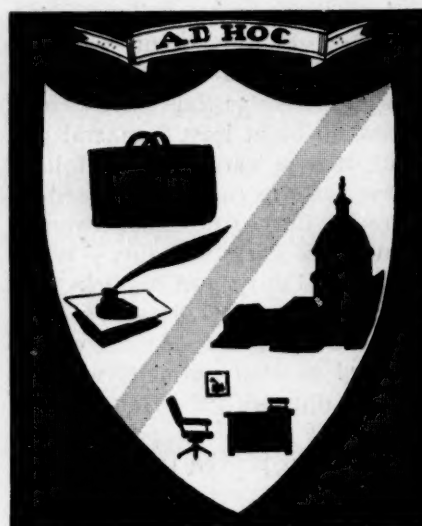
over their careers than is generally possible today. In other words, within the framework of service requirements, the officer's ability, attitude and desires played a far more dominant role in determining assignments than did any preconceived concept of career planning.

It was found that frequently officers drifted into the pattern of "Washington Marines" after some 3 to 8 years' service. This change usually followed one or two tours involving foreign or expeditionary duty. Pattern changes in the opposite direction occurred far less. This does not mean that the vast majority sought less strenuous duty. Rather, from 1890-1915 the exigencies of the service provided the great majority with field experience shortly after entering the Corps. If they found this duty suitable to their tastes they sought to remain "Expeditionary Marines" and their basic patterns reflected no change. It is not surprising, therefore, that almost all patterns either remained unchanged or, if changed, moved in the direction of the staff.

With these considerations in mind, the relationship between the officers' career patterns and unit morale begins to take shape. Men who considered ease and comfort as essential elements of their goal in life did not consider the Marine Corps as a possible career. If by chance they made that mistake, their names soon appeared on the list of resignations. Others felt, after a few years' service, that the insecurity of frequent transfer, the prolonged absences from home, the physical hardships of field duty and the dangers of disease and combat on foreign soil constituted excessive personal sacrifice. Many of these left the ranks of "Expeditionary Marines." Either by request or attitude, they expressed a desire for, and frequently obtained, less trying duty which was more compatible with their interests. Certainly someone had to perform these duties and it would be entirely incorrect and unfair to suggest that they were not well-qualified, capable officers devoted to the Marine Corps. The fact remains that a considerable degree of choice was open to the officer as toward which extreme his career would lean. The career patterns indicate that after expeditionary ex-

perience many elected the alternate. Who was left to lead almost every Marine Corps unit in combat? It was by and large the men who relished the job; men who seemed to thrive on an atmosphere made up of hardship and discomfort. In terms of our working definition of morale they had a common characteristic; the absence of self-pity.

During this period service attractiveness was not a major problem. The Marine Corps had no trouble



filling the few available billets with men who wanted to remain in its ranks. Combat on many expeditions and in WWI testified to its excellent morale. It is obvious that this morale was not in any way a product of policies designed to promote comfortable living. Such policies were generally unnecessary and, with their absence, the danger of confused thinking on morale was materially lessened. It meant that the policies which can promote true morale did not have to be compromised or reconciled with service attractiveness. This fact not only emphasizes the difficult problem we face today, but also suggests the overriding importance of striking the proper balance. The issue of victory or defeat can hinge on morale. Even in a democracy, the same can hardly be said for the conflicting objective of attractiveness.

The Art of Tactics

ARDANT DU PICQ SAID THAT the whole essence of tactics was making men fight with maximum energy. The ability to devise good tactics in a given battle situation will not appear overnight, for this ability re-

quires an understanding of man and his morale, modern weapons, terrain, the enemy and the interaction of these and many other elements upon each other. Good tactics are an art. Not everybody can be a good tactician and considerable study is needed to develop the ability in every case. Part of the knowledge required for such development can come from books, but the majority of it must come from experience and reflection upon that experience.

All this seems quite obvious and very few would voice any objection to it. The fact remains that our current military organizations rarely consider tactics as an art. We traditionally have maintained the ideal that every Marine is basically a rifleman. While this tradition has proved its worth on innumerable occasions, it has also obscured the fundamental truth that years of practice and experience are required to make most of us into really good tacticians. Current career patterns are designed to provide a "well-rounded" background. Under such a program the infantry officer, in particular, rarely if ever obtains sufficient tactical experience. As a result we impose upon our units a level of mediocrity above which they can not rise.

In this respect the examination of officer assignments prior to 1940 is interesting. The frequent transfers mentioned previously were clearly a product of the ever changing commitments of the Corps. When battalions, regiments or brigades were formed for a long period, duty assignments to such units were likewise prolonged. The "Expeditionary Marine" became a true professional. His career afforded him a much greater opportunity to learn the art of tactics than does the career of the average officer today. Yet it has been suggested that the essence of tactics and the meaning of morale alike are the ability to fight with maximum energy. Both of these are most apt to prevail if our units are led by men with considerable experience and tactical knowledge, rather than men whose opportunities to acquire these attributes have been greatly restricted.

The problem again presents itself as one of conflicting interests. The size and complexity of modern military units dictate that the higher

commanders have a broader range of experience than ever before. The primary goal of all military units remains clear and irrevocable. In reaching a compromise between tactical specialization and broad experience, the proper balance is hard to locate. In this age of conflict it is imperative we realize that handling troops in battle is truly an art. The development of this art is essential to victory. It requires a degree of specialization as great as any other field of military activity.

It is evident that the tactical ability of a leader exerts considerable influence upon morale. In fact, without the ability to act, adapt plans and make decisions compatible with the morale of his troops at a specific moment in a given situation, the leader cannot possess real tactical ability. It is this aspect of tactical ability derived primarily from practical experience that is most lacking in today's officers. While our system of schools can provide most of the other elements essential to tactical knowledge, it has not proved itself capable of transmitting this elusive art of making orders compatible with the morale of the troops. This weakness, inherent in a background based almost entirely on formal schooling, has been clearly recognized by several military writers such as du Picq, Fuller and Wavell. It has been descriptively termed a situation where "the 'lens' becomes blurred" or as "the staff threat."

To the man without extensive experience, morale, strategy and tactics tend to be rather intangible elements in warfare. Logistics exert a modifying influence on both tactical and strategic decisions and logistics constitutes a tangible, firm substance with which the school-trained officer can deal. Bullets, bodies, tanks, planes, bombs and shells can all be carefully counted and dispatched to various areas. With these concrete numbers a feeling of confidence grows, but the tremendous strength to be found in the proper utilization of morale through rational strategy and tactics is largely ignored. Logistics dominate rather than modify strategy and tactics; rear area staffs with "blurred lenses" dominate, rather than help, front line commanders.

The examination of officer careers does not give complete evidence on this subject, but the period covered coincided with the growth of formal schooling in the Marine Corps and some tentative conclusions were suggested. The School of Application was officially established 1 May 1891 and served as a forerunner of the present Basic School. Marine officers were later sent to the Navy War College, Army War College, Army Infantry School, Army Gen-



eral Staff College, Army Service Schools and the Army School of the Line as well as to additional Marine Corps schools later established to provide training at higher ranks. This educational program was adopted to answer the need for a better understanding of the new problems created by larger units and technological developments.

This advance schooling was not given to all officers by any means. It was noted that generally those officers attending 2 or more of these schools had basic patterns closer to that of "Washington Marines" than to "Expeditionary Marines." In the expeditions of the 1920s, commanders were not normally chosen from the most extensive school backgrounds, even though such assignments would not have conflicted with requirements of seniority. It was evident that practical experience was much preferred to formal schooling and that the latter was considered important to add final polish, but never as a replacement for the former. The leaders of expeditions were tactical experts chosen for their ability to lead in combat.

In view of this it is logical to conclude that doctrine, plans and orders were made with a clear lens and gave due consideration to the importance of making men fight with maximum energy.

This 2-fold discussion suggests a current need for re-evaluating our assignment patterns and a possible revision of them to provide for a higher degree of tactical specialization. Formal schools are of extreme value, but their limitations should be carefully weighed in order to appreciate their proper role and avoid the error of expecting results beyond their capability. Without such evaluation we cannot hope to create organizational and doctrinal procedures which will serve as fertile ground for the growth of true morale.

Familiarity and Unity

FOR A DEMOCRATIC NATION, THE unity that stems from mutual acquaintanceship is the strongest and most durable of all the tools that help men fight with maximum energy. For most men the motivation supplied by political ideals, love of country and religion largely disappears in the face of danger. Discipline, as practiced by democracies, has not succeeded in creating a threat that is as great as the dangers offered by the enemy. There are many means of avoiding full participation in battle without risking legal punishment. In fact, it is highly probable that many battlefield acts which unconsciously stem from the desire to avoid the full heat of battle may well receive high praise. The primary factor remaining is the bond uniting all men within the organization. If the men have lived and worked together, if they know each other well, they are obligated to perform their duties or be disgraced in the eyes of their immediate associates. The fear of no longer belonging to the group and the desire to be respected and admired by these friends are the most stabilizing influence in the face of danger.

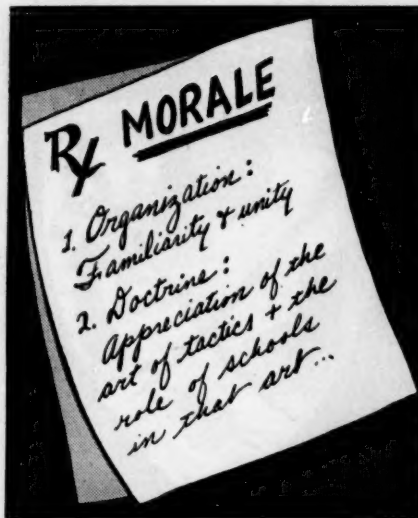
The officer in combat is stabilized more perhaps by his sense of obligation to the men he leads than by his relationship with other officers. This latter relationship is nevertheless an important one for it permits greater confidence in supporting and ad-

jacent units and provides a field for mutual understanding. Equally important is the vertical association between junior and senior officers. Over 85 years ago du Picq considered this association and regarded it as a grave matter. "Today, there is a tendency, whose cause should be sought, on the part of superiors to infringe on the authority of inferiors." The problem exists in nearly the same form today. As a result of rotation systems, personnel problems and assignment patterns, the senior officer frequently does not know the junior. They have no mutual acquaintanceship or understanding, little faith or confidence in each other. The dispersion of modern combat demands that many vital decisions either be made entirely by the subordinate or, at least, be based largely on his estimate of the situation. The conscientious commander quite naturally hesitates to rely so heavily on a factor that is unknown and untested. To a large degree this may also account for the much deplored lack of confidence in NCOs, which in turn has reduced materially their sense of responsibility. Such undesirable relationships breed misunderstanding. They give rise to the practice of constantly harassing lower echelons for information which is then considered to provide a detailed picture of the smaller action. On the basis of this information minute orders are issued to guide the somewhat unknown subordinate. Normally these interfering orders completely miss the real pulse of the distant action they try to direct. To quote MajGen J. F. C. Fuller: "... then 2 battles will be fought, a mythical headquarters battle and an actual front-line one, in which case the real enemy is to be found in our own headquarters. Battles under these conditions are at best half victories and at worst — disaster."

During the early part of the period, expeditionary missions were carried out by provisional units, formed by drawing personnel on extremely short notice from widely scattered duty stations. At first glance it would appear that this system conflicts with all we have said about unity, but closer examination shows this is not the case. Although provisional, these units could not help

but have considerable cohesiveness and unity. The small size of the Marine Corps during this early period bound the organization together and the vast majority knew each other from previous service or certainly by reputation.

Later in the period when units increased in size, the longer tours of duty that afforded greater opportunity to learn the art of tactics also permitted the development of closer associations.



These considerations raise a further question about current practices of officer assignments. It is suggested that the frequent transfer and duty changes within units, which prevent adequate specialization in the field of tactics, also materially hamper the development of firm mutual acquaintanceship which is essential to rational doctrine. Likewise, even though one holds unity to be far less important to morale and successful combat than this paper suggests, it is difficult to think of a policy more undesirable than individual rotation to and from a combat area. Such practices deprive the man in battle of some excellent life insurance.

Conclusion

☛ MORALE CAN NEVER BE PASSIVE; it constitutes either a strength or a weakness. The tremendous influence it exerts on the outcome of battle will hardly diminish with the increased dispersion and terror of atomic warfare. It is of utmost importance that we find an adequate solution to the morale problem. It is largely a realization of this that has stimulated the interest in mo-

rale. Yet, if we are to be successful 3 common errors must be avoided. We must not adopt the attitude that morale can best be ignored and allowed to fend for itself. We must not confuse morale with service attractiveness nor foolishly assume that the same measures can necessarily create both. Finally, we must devote ourselves to the concrete aspects of morale and resist the temptation to dwell on abstract individual qualities or attractive schemes to remold the character of men or the attitude of the nation. These may well be proper considerations of those charged with the direction of this country's basic educational system, but for the military they are impractical panaceas.

Organization and doctrine exert a basic influence on morale. By analysis and revision of these factors we can provide the environment essential to good morale. It must be emphasized that the discussion in this paper barely disturbs the surface of the whole sea of possibilities for concrete analysis. Still, from a limited study of Marine officers' careers such considerations as familiarity and unity, appreciation of the art of tactics and the role of schools in that art, the realistic doctrine and the team work that stemmed from these were immediately apparent. More than anything else such concepts explain the great traditions of the Marine Corps. More than any other factor they account for our combat successes and our outstanding reputation. Just as surprise, concentration and security can be listed among the principles of war, these aspects of organization and doctrine can be classified as principles of morale.

We are confronted each day with the problem of maintaining our military machinery at the highest possible state of readiness while preparing for the warfare of the future. As we attempt to create organizations and doctrines suitable for this age, we must temper our decisions not only with a knowledge of technology, but also with a knowledge of man and his fear of danger. If we have not learned to apply the principles of morale in our organizations of today, what are our chances of providing them in the organizations of the hydrogen age? USMC

passing in review

Aviation's Effect on Civilization . . .

WINGS OF THE DAWN. By Eugene E. Wilson, Hartford, Conn: Connecticut Printers Inc, 1955. 171 pages. \$3.50

Some mature and balanced mind must eventually relate the development of the air vehicle to the progress of civilization. We have had much written on the fringes of the subject, dealing with fractional impact. To the military this impact has taken the form of *Victory through Air Power* as well as *Disaster through Air Power*. In commerce it has appeared as *Ceiling Unlimited*; in literature *North to the Orient* or *Wind, Sand and Stars*. But where has been the philosopher-historian, the Toynbee, to relate the pieces to the whole, the challenge to the response?

Wings of the Dawn is a beginning on such an effort. Mr Wilson weaves two strong themes into a basic conclusion that America's future and indeed that of the world is dependent upon coupling air power to a resurgence of moral principal in international relations. Taking his departure from the days of Pax Britannica wherein maritime power was devoted to enlarging the scope of international trade and of understanding between peoples, he deplores the trends which have made of air power, in contrast to sea power, principally an instrument of pure destruction.

The first of these degenerating trends was the infiltration of the social revolutionary doctrine of Marx. Denying all moral principle, running counter to the heritage of western culture which has made America truly the land of freedom, opportunity and advancement, this doctrine has brought us to the verge of accepting the foolish philosophy that the end justifies the means, even if the means destroys the end.

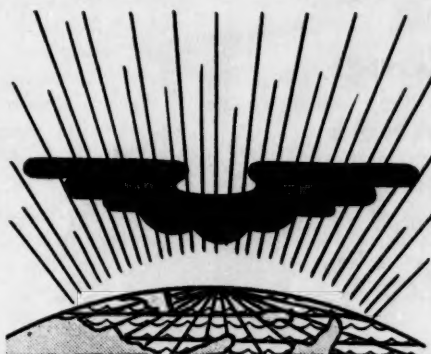
The means, as might be anticipated, is so-called strategic air warfare. For the origin of this, the second degenerating force, we have Giulio Douhet, an Italian artillery officer, to blame. However, for its acceptance as a keystone of US military policy we must blame our own moment of weakness when, as Japan lay gasping, we dropped the atomic bomb on Hiroshima and Nagasaki.

Immoral as this decision may have

been, its most serious effects were felt in the structure of US military forces; for the results served somehow to negate the findings of the US Strategic Bombing Survey which had proved every tenet of the Douhet thesis to be untenable. Disciples of Douhet resurrected his monopolistic concept and claimed the air delivered A-bomb as the ultimate weapon—the handmaiden of unconditional surrender.

Had this not occurred, the US military structure today would be more functional than elemental and hence more sound. Each service would have free access to all the instruments it requires to discharge its responsibilities, the principle to follow being not "unification" but "unity of spirit and effort." To this, a Marine, thinking of his air-ground team, can't resist a smile in agreement.

In the larger picture, if we shall ever negotiate a return to the international climate of Pax Britannica, the first step is re-establishment of international law.



Most of the machinery for this stands ready, though grown rusty through disuse. As with the teachings of Douhet, so too with the denial of morals taught by Marx.

With utter and complete rejection of these two immoral forces, and with the technological wonders of our age devoted to a rebirth of unrestricted commerce between nations of good will, the airplane at last will fill a peaceful role in support of a moral object.

The author's ideas are far from pacifistic in the usual sense. Rather, he contends, military forces are emphatically necessary, on land, at sea, or in the air. It is their mission, and hence their structure, that he would adapt to fit a US policy of providing the envi-

ronment for all nations to prosper in peace. The life blood of the world is in its transportation system. It is to the protection of this that military forces should be keyed.

Within the limits of a self-confident but non-professional author, Mr Wilson pieces together an effective argument based on his own experience in military aviation and on his associations in industry and government. However, an abundance of extraneous material partially conceals his thesis. He makes quite a point, for example, that the income tax structure of the US is a manifestation of Marxism, but without convincing argument it is difficult, indeed, to assess the point as anything other than a diversion from the principal theme.

For one diversion, however, the helicopter-conscious Marine may be appreciative. Mr Wilson's final chapter is a tribute to the aeronautical genius and the spiritual strength of Igor Sikorsky. To Wilson, President of United Aircraft and hence long associated with this aeronautical pioneer, Sikorsky's attitude toward the air vehicle epitomizes the thought behind this book. When asked on one occasion how his affairs were going in Korea, Mr Sikorsky, bowing from the waist in his Old World manner, replied, "Thank you. Our things go very well in Korea. The helicopter has already saved the lives of several thousands of our boys in Korea and the score is still mounting."

The perplexing and probably crucial question which will occur to every reader, and which Mr Wilson's idealistic offering fails to consider, is where does a power like the United States stand against a ruthless, immoral foe. The Marxist religion is designed to take advantage of the weaknesses inherent in the code of chivalry. By deviating to some extent from this code, the West has maneuvered to a standoff with Russia in post-war years. Will foreswearing any element of Machiavellism improve this position? Hardly. Hence, one must interpolate that the author means to retain, now that things have progressed this far, the capability of retaliating massively, in kind. At the same time, the structure of other military forces must be reoriented to provide relatively independent capabilities to employ all

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Reviewed by Col N. J. Anderson

ED: Col Anderson is Chief of the Air Section, Tactics and Technique Board, Marine Corps Development Center.

Crouchback Revisited . . .

OFFICERS AND GENTLEMEN—

Evelyn Waugh. Boston: Little, Brown and Co. 339 pages. \$3.75

The redoubtable Guy Crouchback is at it again in the service of his Britannic Majesty. Having completed the first year of World War II in *Men at Arms*, Lt Crouchback continues his military adventures in *Officers and Gentlemen*. This book covers the period from the Fall of France through the forced evacuation of Crete in 1941.

It is not necessary to have read *Men at Arms* in order to fully enjoy *Officers and Gentlemen*, but those who have done so will find it easier to grasp the characters initially in the latter volume. Author Waugh notes that the two books "constitute a whole."

Although Mr Waugh has written a story which is basically amusing, there is an underlying serious theme which is best expressed by one of Guy Crouchback's acquaintances:

"... Heroes are urgently required to boost civilian morale. . . . But not about your racket, Guy. They just won't do, you know. . . . Last-war stuff. Went out with Rupert Brooke. . . . Hopelessly upper class. You're the 'Fine Flower of the Nation.' . . . This is a People's War, and the People won't have poetry and they won't have flowers. Flowers stink. The upper classes are on the secret list. We want heroes of the people, to or for the people, by, with and from the people."

Consequently, a portion of the book is devoted to the problem of producing such a hero. In order to retain the Commando units, the Hazardous Offensive Operations Headquarters must enlist public opinion and there exists a desperate requirement for a hero to accomplish this. In all the British Isles there is at the moment only one Commando lieutenant and eight men. The officer is known formally as McTavish, informally as Trimmer and in pre-war tonorial circles as Gustave. A "hazardous" landing on a Channel island is planned for Trimmer and his men, and a HOO HQ PIO is assigned to guarantee that the former hair-stylist becomes a hero. It is a difficult job and all plans go awry (they land on the French coast by mistake), but Trimmer duly becomes an official hero. In addition to Trimmer, there are many intriguing characters.

The frustrating activities of the Commando units—always preparing for action but never getting any, until the end of the book—can be well appreciated by military readers.

Mr Waugh presents a serious and action-filled account of the fight for Crete. Here at last Crouchback (a temporary captain) and the Commando units find the military action they have been seeking so long. They are dispatched to Crete as reinforcing units, and consequently get there only in time to participate in the grim fighting retreat which the British had to effect in the dark days of 1941.

As the title of the book indicates, the story is principally concerned with British officers, their virtues and their faults. As can be expected there are good ones, poor ones, routine ones—professionals and amateurs. And with the effective assistance of the very British Evelyn Waugh, the actions of these officers make a most readable story.

Reviewed by LtCol John A. Crown

With Some Pride . . .

US MARINE OPERATIONS IN KOREA

—Lynn Montross and Capt N. A. Canzona, USMC. Wash, DC: Govt Printing Office. 271 pages. \$2.00

Like many others, I had read an earlier review of *Volume I* of *US Marine*

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Operations in Korea and wondered if Mr Montross and Capt Canzona had begotten a Frankenstein. The answer is definitely no.

The basic intent of the book, as stated in the preface by General Wornham, is . . . "to give the military student and the casual reader an accurate and detailed account of the operations . . . 2 August . . . 13 September 1950." The military student might desire more on the caliber of the leadership and on the soundness of the doctrine. The authors have, however, most certainly accomplished the objective as stated in the preface. If, in doing this they noted a few firsts, pointed out the value of the Marine Air-Ground Concept, and commented on the versatility of the helicopter, it is, after all, just history (and admittedly some pride, which under the circumstances is not unnatural).

The book is comprised of two parts. The first 103 pages contain background information beginning with a discussion of Korea's strategical history and ending with the events of the formation and movement of the Brigade to Korea. Some will find this part too sketchy; others will think it too long. All will agree though, that it does serve as a practical historical introduction to the series.

In the narration of the 3 actions of the Brigade, Sachon and the two Nak-tong offensives, the authors are at their best. The writing is crisp and concise. The style is fast-moving and interesting and in no instance does it get bogged down in minutia. The continued injection of individual effort produces readable history. Furthermore, it will give many readers that special flavor garnered from reading of friend and acquaintances.

The authors have quite obviously avoided particular praise of individuals. The closest they come to lauding anyone is in an account of an attack by How Company. In it they tell, in one sentence, of the actions of Corporal Melvin James. The sentence has the following footnote: "James was awarded the Distinguished Service Cross for this action."

In presenting an objective history of a military operation mistakes are naturally brought to light. This volume is no different. However, in this instance, Mr Montross and Capt Canzona have not seen fit to make editorial comment—leaving it for the reader to do.

The casual reader and the less experienced military student will find the maps somewhat inadequate though they appear in quantity. (There are 25.) Some lack detail while others contain too much. Consequently many will

spend too much time orienting themselves or will read on a bit confused. This is aggravated further by the maps not being referenced in the text.

When you reach the last page you have the feeling that perhaps there could have been more. It might, however, only reflect the reader's anticipation of the 3 volumes to follow.

Reviewed by Capt W. M. Tatum, Jr.

Chemical Reaction . . .

CAVES OF BIAK: AN AMERICAN OFFICER'S EXPERIENCES IN THE SOUTHWEST PACIFIC—By Col Harold Riegelman, USAR (Ret). New York: The Dial Press. 278 pages, maps, sketches, prefatory notes by Gen Robert L. Eichelberger and Ambassador Hu Shih. \$4.00

Harold Riegelman served as an Army Chemical Officer in France during WW I. In 1942 he became the I Corps chemical chief. He held this position until 1945, declining opportunities to advance to higher posts because, in his own words, he "liked Corps, liked troops, liked tactical work." His book is a thoughtful, analytical account of I Corps operations in New Guinea, Biak and the Philippines.

Col Riegelman's narrative makes interesting reading, and his discussion of chemical problems is a valuable one. Especially illuminating are those portions of *Caves of Biak* describing the reduction of Japanese cave defenses, not only on the island from which the book takes its name, but also in other areas of the Southwest Pacific where the enemy burrowed deep into the earth, determined to sell his life as dearly as possible. How well-coordinated teams of specialists used flame, explosives, white phosphorus and smoke to eliminate these dangerous underground positions makes a fascinating story. The author's own sketches illustrate his detailed descriptions.

One of Col Riegelman's prime concerns was the ever-present fear that the Japanese would employ gas against American troops or that a stray shell would set off an enemy chemical dump and release a dangerous gas cloud.

Another problem that the author describes is the development of flame throwers and the tactics for their use—from the first pitifully ineffective weapons employed at Buna to the grimly efficient ones used later by teams of well-trained soldiers against difficult Japanese cave and bunker positions. Marine veterans of the Pacific will find much of interest in these pages.

The author writes well, in a terse, imaginative and thoughtful style. His

account includes so much detail that it must have been based in large measure on a diary; official records were apparently consulted also. The maps in the book are simple but adequate, and the lack of an index is the volume's only serious omission. Finally, the author's thoughts on the history and peoples of the areas he visited reveal a sympathetic insight that makes *Caves of Biak* more than just another war memoir.

Reviewed by Capt Stanley L. Falk

Professional MCI Courses . . .

SOVIET MILITARY DOCTRINE, by R. L. Garthoff, The Rand Corporation, 1953; lesson commentaries by MCI, Washington 3, D. C.

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The basic text is a reprint of part of Garthoff's excellent work for the Rand Corporation under the sponsorship of the US Air Force.

These courses are highly recommended for all Marines.

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